MEETING OF THE LEICESTERSHIRE COUNTY COUNCIL

WEDNESDAY, 2 JULY 2025 AT 2.30 P.M.

ORDER PAPER

EVACUATION PROCEDURE

In the event of having to evacuate officers will be able to advise and be on hand to assist any disabled persons.

AGENDA ITEM NO. 1
CHAIRMAN'S ANNOUNCEMENTS

The CHAIRMAN will make his announcements.

AGENDA ITEM NO. 2
MINUTES
(Pages 3 - 12)

The CHAIRMAN will move and the VICE CHAIRMAN will second:

"That the minutes of the meeting of the Council held on 14th May 2025, copies of which have been circulated to members, be taken as read, confirmed and signed."

AGENDA ITEM NO. 3
DECLARATIONS OF INTEREST

The CHAIRMAN will invite members who wish to do so to make declarations of interest in respect of items on the agenda for this meeting.

AGENDA ITEM NO. 4
QUESTIONS ASKED UNDER STANDING ORDER 7(1) (2) & (5)

(A) Question by MR HOLT

""During my election campaign residents brought to my attention increased instances of speeding on the Blaby Road, from the foxhunter island towards Enderby and also Whetstone - with one resident clearly stating "it's only a matter of time before someone loses their life." Unfortunately, there have been accidents causing damage to property, and only a few days ago we woke up to the sad news of yet another accident and the tragic loss of life of a young man who was only 20 years old.

Will the new administration commit to reviewing the speed restrictions on this stretch of road in an effort to make roads safer for both drivers and local residents?"

Reply by MR WHITFORD

“Council Members and officers are sorry to hear of this loss of life and send our condolences to those affected. As the Local Highway Authority (LHA) road safety is a key priority and as the outcomes of road safety incidents such as this are understood through police investigations, any identified actions will be taken with the aim of preventing further incidents in the future.

The LHA investigates reports and concerns from the community of speed related issues. When setting speed limits local authorities are obliged to work to guidance issued by the Department for Transport (DfT) to help give a consistency across the country, this guidance is set out in the DfT’s Circular 01/2013 “Setting Local Speed Limits” and provides guidelines to local authorities for the setting of new speed limits. The guidance explains that when setting speed limits, the Council must take into account various factors such as the history of collisions, the road’s function, existing mean traffic speed, and the road environment including level of road-side development adjoining the carriageway and the likelihood that drivers will adhere to a posted limit through self-compliance as opposed to through physical intervention or enforcement.

The B582 is a single carriageway predominately urban road that runs from Whetstone through Enderby, where the road then becomes rural along Desford Road to the junction with the A47 Hinckley Road. The set speed limit is 30mph from Brockington College/ M1 Bridge to EH Smiths/ NEXT where it then increases to 40mph leading to Desford Road where the speed limit then becomes National.

Unfortunately, even with posted speed limits and measures in place, motorists will often judge what is an acceptable speed for a road based on the level of development there is adjoining the highway. This is something both the County Council and the police consider when setting and enforcing speed limits respectively. The speed limits in place along the B582 are in line with the speed limit guidance and conducive to the varying road environment and roadside developments along its length.

It should also be noted that in general physical calming features such a speed tables and chicanes, are not measures that are implemented on A and B classification roads due to volume and type of traffic using them and also the principal road network purpose they serve.

Leicestershire County Council as the Local Highways Authority, is responsible for the implementation of speed limits; however, enforcement of speed limits remains a matter for Leicestershire Police to undertake if drivers are not travelling at the posted limit. Residents can raise their concerns direct to the police via https://www.speedorsafety.com/community

A speed survey was undertaken on the B582 between Moores Lane and Conery Lane between 21 June and 28 June 2021, with survey results as follows:

	Mean	85th %
All traffic (Both directions)	29.5 mph	34 mph
Southeast bound traffic	28.6 mph	34 mph
Northwest bound traffic	30.4 mph	35 mph

When assessing if a road would be considered an area of concern, the police would normally advise that the 85th percentile of speed should be above the National Police Chiefs' Council threshold for prosecution which is 35mph (speed limit + 10% + 2mph) in a 30mph speed limit. The results of the survey show a reasonable compliance with the 30mph speed limit. The County Council would therefore not look to make any changes to the speed limit along this particular section of road.

At present, there are no plans to introduce measures along the B582 through Whetstone and Enderby, but the Council alongside the police will continue to monitor the situation and look to take any mitigating action should persistent and continual issues arise."

(B) Question by MR HOLT

"HGV traffic is an ever increasing problem in Enderby village, with drivers using it as a cut through. This has caused the roads to be blocked as drivers attempt to reverse back to the main road, and also significant and repeated damage to vehicles and property as they attempt to navigate the roads that are clearly unsuitable for vehicles of this size. This scenario is likely to only become worse and more frequent as Blaby District Council have recently approved planning permission for a huge Logistics Hub to be built on the outskirts of the village. Will the new administration commit to reviewing the acceptable access points to the village for vehicles of this size to prevent these unnecessary incidents from occurring and causing misery to residents?"

Reply by MR WHITFORD

"Seine Lane, Conery Lane, Moores Lane, Chapel Street, High Street, Cross Street and Broad Street have 7.5 tonne environmental weight restrictions in place with illuminated signage present. Therefore, we would expect all Heavy Goods Vehicles to be using the non-weight restricted routes available which are the B582 Blaby Road, Forest Road to access Seine Lane and Hawgrip Garden Centre. Furthermore, "unsuitable for HGV" blue signage has been provided on the junction with High Street and The Cross approaching Chapel Street.

It is evident that on some infrequent occasions drivers are ignoring both the "environmental weight restriction" and "unsuitable for HGV" blue signs and possibly following satellite navigation technology, resulting in these vehicles

mistakenly travelling through the village centre. This error leaves no alternative route available to physically turn around or access the B582 Blaby Road, without travelling through the village, which I can fully appreciate is extremely frustrating for residents.

Where environmental weight restrictions are in force in Enderby Village, the County Council would advise that if anyone suspects that a vehicle is travelling along the roads within the restricted area in contravention of this restriction, the police should be contacted as they are currently the only authority in Leicestershire with the necessary powers to take action against such contraventions. Please remember that in a significant proportion of suspected contraventions the HGVs are travelling legally. If they are loading and unloading at a location within a weight restricted zone they can legally take any route into and out of the zone to reach and leave their destination.

It is important to note that enforcement against a driver is a very time-consuming exercise and is not always effective – the police have to witness a suspect vehicle entering a weight restricted area, follow the vehicle until it leaves the area without loading or unloading, and then stop the vehicle in a safe place. Any enforcement action is then taken against the driver, who may never be on that route again, or who may be an overseas driver and therefore difficult to prosecute. It helps to have details of the date, time, direction of travel, vehicle registration mark or company details. Any such instances of this should be reported to the police on the non-emergency 101 telephone number or via the online reporting form at: https://www.leics.police.uk/ro/report/rti/rti-beta-2.1/report-a-road-traffic-incident/ or https://www.leicestershire.gov.uk/roads-and-travel/road-maintenance/weight-restriction-monitoring. It is important to inform residents that all suspected vehicles entering the weight restricted area are reported to Leicestershire Police, to investigate as required.

Notwithstanding this, the County Council did propose a one-way with no access from the B582 on Conery Lane and Moores Lane in Enderby, to physically stop these movements and mitigate the concerns raised. After undertaking a consultation with residents of Moores Lane, Conery Lane and Chapel Street, the feedback and general consensus was that residents did not support the introduction of the proposed one-way as outlined in the petition response provided in November 2023. The County Council's view, as previously stated is that whilst additional signage provided on the network would help to increase awareness to HGV drivers, it would not categorically prevent drivers mistakenly travelling along High Street from the B582, and the only measure to absolutely prevent the reported concerns would be to physically stop all vehicular access from the B582 onto High Street, Moores Lane and Conery Lane.

The County Council will again engage with Hawgrip Garden Centre, to ensure that their suppliers and any new haulage firms and drivers use the non-weight restricted B582 Desford Road and Forest Road to access Seine Lane. Whilst all businesses, including Hawgrip, have been extremely supportive and continue to be proactive concerning the matter, unfortunately it is not possible to ensure that this message is received by every haulage driver as they frequently change. Positive "All HGV's no access through village centre" signage is also present on Seine Lane directly opposite the access to Hawgrip Garden Centre, with further

signage present on Thurlaston Lane and Forest Road.

Permanent “unsuitable for HGV” blue signage has been installed on High Street/ The Cross, Moores Lane and Conery Lane, junctions with the B582 Blaby Road. County Council officers are satisfied that both the 7.5 tonne weight restriction (except for loading), along with the “unsuitable for HGV” signage present on High Street, Moores Lane and Conery Lane, is consistent and visible to road users travelling along the B582.

Following the recent concerns raised and to try and increase awareness further to drivers, the County Council is currently looking at additional signage on High Street and the junction with the B582, advising all HGVs to use the B582 when travelling to Hawgrip Garden Centre.”

(C) Question by MR HOLT

“There have been continuous reports to myself and our district councillor of dangerous and irresponsible parking by drivers in Enderby, with cars often parked on double yellow lines, blocking access points to roads and left in a manner that makes it dangerous for pedestrians crossing the road.

I understand the previous administration completed research and resident surveys to understand this problem and explore possible solutions but nothing was ever changed - suggesting the current model is acceptable. Will the new administration commit to making this information and raw data available to me for review?”

Reply by MR WHITFORD

“In terms of previous work, a detailed village wide review was undertaken to explore a range of issues raised with the Local Highway Authority. This included a Microsim (traffic simulation model) review to explore the impacts of implementing a one-way system in the village of Enderby, which was undertaken in December 2017. The review concluded that a one-way system would not make a material difference in traffic flows, nor would it reduce congestion, particularly at peak times. The one-way system proposal was therefore not progressed any further.

Residents’ parking was also considered as part of the village wide review with a view to alleviating reported congestion issues. A proposed residents’ parking scheme on roads within the village was consulted upon at that time but was ultimately rejected by residents with the majority not supporting such a permit scheme. This scheme was therefore not progressed any further.

However, a number of measures have been introduced since, namely:

- Conery Lane and Moores Lane, High Street - “unsuitable for HGVs” signage introduced in 2019/2020.
- Townsend Road – one-way system introduced in 2019.
- Double Yellow Lines - parking restrictions introduced on Kipling Drive/ Stewart Avenue/ West Street/ Shortridge Lane/ King Street and Townsend

Road in 2018/19.

- Mill Lane – School 20mph zone and School Keep Clear Project introduced in 2018.
- Townsend Road – parking restrictions introduced on the junction with George Street in November 2020.
- Mill Lane – additional double yellow lines introduced in 2024.
- Rawson Street and Cornwall Street – additional double yellow lines introduced in 2023/2024 to aid Blaby District Council and residents with waste collection services.

With reference to additional parking restrictions, most de-restricted parking within Enderby village is utilised for the significant number of residents with no or limited off-road private parking available. Any additional parking restrictions introduced would leave these residents with no parking available near to their properties which would also create displacement of the required parking.

The County Council only has the power to deal with the issue of parking where there are waiting restrictions present, or when a vehicle is blocking all or part of a dropped kerb that is intended for use by pedestrians to cross a road. The County Council expects all residents and visitors to be considerate of where they park their vehicles to ensure that highway users and residents are not inconvenienced, and park in accordance with the Highway Code; however, it is appreciated that this is not always the case.

It does remain an offence under the Road Traffic Act 1988 for any person in charge of a vehicle to cause or permit that vehicle to stand on a road/footway in such a manner that is considered to be dangerous, or that which causes an obstruction to the safe and effective use of the highway. Any such instances should be reported to the police on the non-emergency number 101 or email at the following address https://www.leics.police.uk/ro/report/rti/rti-b/report-a-road-traffic-incident/.

The Microsim review is appended to the Order Paper for information.

(D) Question by MR HOLT

"It has been brought to my attention that the access road to Abbey Road in Enderby is dangerous at the entry and exits points because each end of this narrow access road allows both entry and exit. This is often creating a 'near-miss' accident and is only a matter of time before there is an accident involving another car, cyclist or pedestrian and someone is injured, or worse.

Will the new administration commit to reviewing this access road and consider making it a one way to ensure the safety of all road users - including those using the cycle lane users and pedestrians?"

Reply by MR WHITFORD

"This service road has been present since the Abbey Road and Warren Road housing development was constructed including the B4114 dual carriageway. The

service road layout has been constructed and junctions built to encourage road users to access the service road at the first junction approaching Abbey Road and exit on the south end of the service road to join the B4114 towards Narborough.

There are no records of any previous enquires concerning any difficulties being experienced on the service road/ junctions or any personal injury accidents recorded by Leicestershire Police in the last five years. This indicates that most road users are accessing and exiting the service road as would be expected. Whilst there may be some road users who are not familiar with the layout accessing and exiting the service road at both junctions, there are give-way road markings present, and manoeuvring should be at reduced speeds as would be the case at any junction on the highway.

This section of the B4114 Leicester Road has many private driveways along it with a number of other junctions along its length. There will therefore be vehicles entering and exiting private driveways at various points requiring approaching drivers to slow down to allow these manoeuvres to safely take place. The Abbey Road service road junctions are no different to this.

If there is any evidence that can be shared with the Council that highlights these issues being reported, the Council will investigate further.

Whilst there are currently no plans or evidenced justification to introduce a one-way system on the service road, please be assured that the concerns raised have been recorded, and the Council will consider this, and any other appropriate actions should evidence come to light highlighting a realised road safety issue in line with its criteria."

(E) Question by MR SMITH

"1. Following Reform UK's recent electoral success and comments by Lee Anderson MP calling for an end to home working for council staff across the East Midlands, can the Administration clarify its position on flexible and remote working arrangements at Leicestershire County Council?

2. Does the leadership intend to make any changes, or does it continue to support the current approach based on service delivery, efficiency, and staff wellbeing?"

Reply by MR D HARRISON

"I understand that the Smarter Working Policy, which defines the different working arrangements for Council employees, was approved by the Employment Committee in 2015. Although it has been adapted since, particularly during Covid, it would be appropriate to review the policy ten years on.

I have asked for that to be undertaken by the Employment Committee and for their recommendations to be forwarded to the full Council. I would expect the recommendations to recognise the need for consultation with the trade unions and staff as part of the review."

(F) Question by MR POLAND

"At the Scrutiny Commission meeting on 9th June, the Leader told the Commission *"We don't think we'll have a visit from the DOGE."* He went on to tell members:

"We have to have a proper thought-out scheme with a reliable partner who is able to accomplish that {the audit} for us and not just come in and bang a big drum and save a few million here and there. We have a specific problem; we've got to try and concentrate our thoughts on how we can deal with it correctly and professionally."

It is reasonable to infer from those comments that the Leader does not therefore view the Reform UK DOGE Audit Team as a reliable partner and that, based on his comments, he wouldn't see the use of that team as dealing with the audit correctly or professionally. That the Leader holds that view is further confirmed when Mr Harrison answered a question from Mrs Taylor regarding the cost of external auditors stating:

"Inevitably there will be a cost. Outside sources of the style and standard and professionalism needed, there would be a cost."

Following the Scrutiny Commission meeting, Leicestershire Live reported that Reform UK had told them that party bosses "expected" all of the councils it controlled to "welcome" the audit team in.

Given the Leader's very clear view on the Reform UK DOGE team, can he again confirm that the DOGE team will not be coming to audit Leicestershire County Council?"

Reply by MR D HARRISON

"Thank you for your question. The new Reform UK Administration inherited a financial mess from our predecessor administrations and their national parties in government. Their failure over 24 years whilst in control has necessitated this Administration to take immediate action to reduce the current Medium Term Financial Strategy (MTFS) gap of £90m by 2028/29. We also need to know the impact on the MTFS of the Government's Spending Review (announced on 11 June) and a report will be brought to the next meeting of Cabinet by the Director of Corporate Resources, highlighting the Spending Review's impact and implications for the County Council's finances and services. It will also address as far as possible the implications of the Government's review of local government funding announced on 20th June.

Mr Poland, however, is incorrect in his understanding of my view of DOGE. At the Scrutiny Commission I was referring to DOGE visiting those councils who have a Reform UK majority control, starting with Kent. It has since become clear that DOGE has offered to assist councils with a Reform UK minority administration and I recently said to the Opposition Group Leaders that I have invited DOGE

here for an initial discussion, although the commissioning of a review would be a matter for decision by the Cabinet, a key decision. At the same meeting, the Director of Law and Governance explained the requirements around data protection and the limitations on data sharing which would apply.

At its meeting later in July, the Cabinet will consider what sort of efficiency review it wishes to commission. Rooting out inefficiency and waste was a key platform of our election mandate in May and is something the public clearly supports. We will not shy away from taking tough decisions needed to put this Council on a firmer financial footing.

Mr Poland may also be interested to know that other County Councils under Reform UK control, such as Nottinghamshire, Derbyshire and Lancashire, have taken the initiative to commission work on their own efficiency reviews, without waiting to be visited by the DOGE team."

(G) Question from MR ORSON

"At the Melton Borough Full Council meeting on March 27th the Portfolio Holder for Governance, Environment, and Regulatory Services stated that £34.7 million had been secured through S106 contributions for education across the Borough over the past decade. However, records indicate that only £8.7 million has actually been collected by Leicestershire County Council.

Given this significant discrepancy, will the Leader acknowledge that District Councils must take greater responsibility in ensuring that S106 funds from developers are properly collected and allocated, so that Leicestershire County Council can deliver the essential services our communities depend on?"

Reply by MR FOWLER

"It is important to be clear about the distinction between secured and collected contributions, and the sensitivity around how they are reported.

A secured contribution means that there is a completed legal agreement in place to ensure that, should the development go ahead, the developer is legally obliged to pay the relevant contributions. Legal agreements that have not yet been completed and are still under negotiation are not included in any reports on secured contributions.

Collected means that the relevant contributions have been paid to the County Council.

Leicestershire County Council's records show that, over the ten years period from April 2015 to March 2025, a total of £18.7m had been secured for Education (including Early Years, and SEND) in Melton borough.

Over the same ten years period, £8.7m has been collected for education in Melton borough.

I am aware of 3 agreements in the Melton borough that are still under negotiation with relevant parties. These agreements, if completed as expected, will secure a further £17.7m in contributions for Education, and the land for a new primary school.

The £18.7m already secured for Education, when added to the £17.7m in negotiations, exceeds the £34.7m figure Mr Orson refers to in the question. At any given time, there will always be a gap between contributions secured and contributions collected. Legal agreements are entered into at the point of planning permission being granted, and the Planning Obligations Team records the contributions secured once all relevant parties have legally completed the agreement.

However, the legal triggers for payment of contributions are, typically, at the commencement of development and then at key points of progression, such as the first dwelling to be occupied. The time lag between planning permission being granted (and the amount secured being recorded), and the legal triggers being reached, will account for much of the gap between contributions secured and contributions collected at any given point in time.

Other factors to bear in mind are that some developments, for whatever reason, may not ultimately go ahead despite planning permission being in place, whilst others can run into viability problems during construction. Such factors also mean that the contributions secured figure, at any given point in time, will always differ from the contributions collected figure.

Turning to the substantive point of the question, I am aware of the positive working relationships between the County Councils Planning Obligations Team and the Development Management and Planning Policy Teams at the district councils.

I expect this relationship to continue to be positive and that the district councils will work closely with the County Council on the sharing of information and intelligence about the implementation and progress of approved developments, including situations where permissions with agreements lapse or are superseded, to ensure that developer contributions are being monitored and collected as efficiently as possible, and to ensure that information about secured contributions is up-to-date.

More importantly, district councils should be doing everything within their planning powers to ensure that they are approving viable developments that are capable of making their full contribution to essential community services. Officers are aware of several instances where applicants have sought to reduce S106 contributions on the basis of site viability. This is a concern for the Council particularly in respect of education provision and highways and transport infrastructure, given the absence of adequate developer contributions gives rise to substantial financial risks for the County Council in the performing of its statutory duties. Other contributions such as those that support recycling and household waste sites and community facilities are also often reduced, leading to the risk of shortfalls in the future in these service areas.

Melton Borough Council introduced a Supplementary Planning Document (SPD) to inform prioritisation of developer contributions if viability issues occur and this prioritises highways and education contributions in order to manage the larger financial risks. In line with the Council's statutory duties to provide school places for children living in the new development the Council cannot accept reduced education contributions as part of viability negotiations.

It is important that the Borough Council in its role as planning authority does everything within its powers to require that development coming forward funds the necessary infrastructure to ensure that new development is sustainable and its residents can access the services they need."

(H) Question by MR MELEN

"I'd like to highlight the excellent work carried out by Nigel Palmer in securing over 1,000 petition signatures calling for improved safety at the Bull in the Oak Junction, near Market Bosworth. I would request that Leicestershire County Council Highways Department gives full consideration to the proposals made and responds with speed."

Reply by MR WHITFORD

"The County Council is in receipt of this petition and through an evidence-based appraisal will consider the justification for installing traffic signals at the Bull in the Oak junction.

In addition, the Council will need to assess the feasibility of installing traffic signals at this junction, which will involve the undertaking of a data collection exercise to gain up to date information on traffic flows and counts at the location. This along with accident and speed data is essential in considering the petition and will enable the junction's current performance and capacity to be assessed. Following the data collection, a simulation replicating conditions of traffic signals will be carried out to understand if it would be feasible to introduce signals by assessing any congestion impacts on current traffic flow as well as considering future demand and growth.

The data collection exercise along with the full assessment will take time to complete. It is anticipated that the Council will be in a position to fully respond to this petition during September 2025.

Please be assured our investigations will consider all aspects of the concerns raised, including a review of signage in and around the crossroads, and any other potential improvements which could be considered necessary."

(I) Question by MRS TAYLOR

"1. Could the Leader please advise how his private meeting with Sir Peter Soulsby regarding Local Government Reorganisation (LGR) went? Was any agreement reached?

2. What is the Leader's view on the way forward for the County Council regarding LGR?

3. The Leader advised the Scrutiny Commission on Monday 9th June that he was working in collaboration with the Districts/Boroughs and Rutland Councils. Two hours after the Leader said that, their North, City, South proposals went out for public consultation, why?

4. When will the Leader be publishing a public consultation from the County Council so residents can input their views?"

Reply by MR D HARRISON

"1. I have met Sir Peter on several occasions since I became Leader and we are working constructively on what is best for the County and the City together.

2. As above: what is best for the County and the City together.

3. That is a question for the Leaders of the district councils and Rutland. They did not inform me of their intention, nor I understand did they inform Sir Peter.

4. It will be important to consider the Government's guidelines on consultation before any decisions are taken."

(J) Question by MRS TALYOR

"In Reform UK's local political leaflets for the May 2025 elections and at Reform UK's national launch of the elections in Birmingham, Reform UK informed Leicestershire residents how much Leicestershire County Council's Chief Executive was paid, stating that his salary was an extortionate amount and should not be allowed. Can I ask:

1. Is the Leader happy with the current Chief Executive's salary?

2. What does the Leader believe is a reasonable starting salary for the new Chief Executive and will the Leader commit to not recruiting a new Chief Executive on more than that figure?

3. If the Leader is unhappy with the current Chief Executive's salary, will he introduce a salary cap for the new Chief Executive as part of their contract to ensure inflation and other contractual pay increases do not push their salary beyond a certain level even if they give decades of service to this county as the current Chief Executive has?"

Reply by MR D HARRISON

"Thank you for your question. In response to the first paragraph of your question,

political literature was produced by the Reform UK Party's central office, over which local candidates had little control. After the election, I took the opportunity to personally apologise to the Chief Executive, who has provided many years' dedicated service to the communities of Leicestershire.

I'm very happy with the current Chief Executive's performance and that of his staff, supporting the transition to a new Reform UK Administration following the County Council elections in May. I am also grateful to the Chief Executive agreeing to postpone his retirement until November this year.

No decisions have yet been made regarding the recruitment of a new Chief Executive and Head of Paid Service, but I have said to Mrs Taylor and the other Group Leaders that with the possibility of new structures of the local government in the short term, I am inclined towards an interim appointment. The appointment process is set out in the Constitution of the County Council, part 4H Officer Employment Procedure Rules. It is also worthwhile to note that Member involvement will be on a cross-party basis, with a politically balanced Chief Officer Recruitment panel making a recommendation to the full Council for approval.

Regarding salary levels, caps and contractual arrangements, those details will need to be agreed during the recruitment process, with regard to the nationally set Chief Executive salary scales."

(K) Question by MR MULLANEY

"Residents living in the Ashby Road area of Hinckley are extremely concerned about safety issues on the road. There's a concern about excessive speeding on the road and the risk of accidents on the road. This has been heightened by a tragic accident involving a motorcyclist on the road on 13th June 2025.

Could County Council Highways please look urgently at this situation. Can a thorough assessment please be taken of the risks of accidents on Ashby Road and an assessment taken of what road safety measures are needed on the road to reduce the risks of accidents. The problems on this road are also heightened by it being linked to Normandy Way which has also had a number of accidents including tragically fatal accidents and ongoing problems with speeding which need to be addressed also."

Reply by MR WHITFORD

"Leicestershire County Council reviews all collisions annually and investigates any emerging issues or clusters sites in the County where groups of injury collisions have occurred within the most recent five years, or more specifically, looking at the most recent five years of available data as there is a delay between a collision occurring and that data being validated and available to the Council. Currently, the Council has validated data up to the end of 2024.

Where patterns in the data are obvious, and an intervention can be identified, justified, and implemented within the available budget, schemes will be developed, and mitigation measures provided. Throughout the year, this cluster

site analysis is reviewed and repeated so that the Council is aware of any emerging problem sites.

In addition, the Council produces an annual casualty reduction report where specific road safety elements are reviewed. This includes cluster site analysis, general route analysis and route analysis for all County roads that are assigned the national speed limit. The report is taken to the Highways and Transport Overview and Scrutiny Committee at its March meeting every year (the latest report being presented on 6 March 2025 can be found here).

The Ashby Road/Normandy Way junction is currently being investigated as part of the annual cluster site programme. This analysis will determine what improvements could be considered at this junction and along Ashby Road. Once that analysis is complete, an update on the outcome and any proposed improvements which are identified will be provided.

The Council is aware of the incident which occurred on 13 June 2025 and would seek to assure members and the community that this will be reviewed as part of the ongoing analysis and investigations."

(L) Question by MR POLAND

"At the Cabinet meeting on 7th February the Director of Environment and Transport confirmed the Department was investigating the possibility of giving local Flood Wardens the power to close roads in a flooding situation. After the flooding on the 6th January, and indeed after previous flooding incidents, Flood Wardens told me they would welcome the power to close roads to stop traffic trying to come through as this creates bow waves which can cause or exacerbate internal property flooding. Would the Leader be able to provide an update on this matter please and can he confirm if Flood Wardens will be given road closing powers in time for any floods which may occur this autumn or winter?"

Reply by MR TILBURY

"The powers to close a road rest with the police and the Highway Authority under sections 14 and 67 of the Road Traffic Regulation Act, but as a Highway Authority, the Council would also need to consider any duties under the Highways Act 1980. There is no clear directive that stipulates that the powers to close a road can be delegated to volunteers and so any delegation of authority to VFWs would have to ensure that all aspects of the relevant statutory obligations are followed.

Statutes surrounding road closures include:

- The Road Traffic Regulation Act 1984 (as amended)
- Road Traffic (Temporary Restrictions) Act 1991
- The Street Works Regulations 1995 (Accreditation Units 1 and 2)
- Traffic Signs Manual, Chapter 8 (as amended)
- Department of Transport Departmental Standard TD 21/85 & TA 47/85
- The Traffic Signs Regulations and General Directions 2016

The Council is therefore taking legal advice on how to achieve this and also how to ensure the safety of our volunteers. Once a proposal has been developed, it will be presented for consideration by the volunteers and the Lead Member for flooding. It is likely that investment in training will be required in order to meet the requirements of these statutory obligations which will have to be undertaken prior to implementing the scheme."

(M) Question by MRS BOTTOMLEY

"Leicestershire has experienced increasingly regular and devastating flooding in recent years. As the Lead Local Flood Authority, Leicestershire County Council has a statutory duty to provide a section 19 report after major flooding events. The report for Storm Henk, which occurred in January 2024, has an estimated publication date of January 2026. The Leicestershire County Council website states "in the time between flooding occurring and the formal flood investigation publication, the Council and partners seek to keep affected communities up to date with investigations and actions, so that by the time of publication, most of the contents is already known." While this is a sensible and logical practice, it is at odds with the experiences being reported to me by residents, the Parish Councils in my division, and Charnwood Borough Council. Can the Lead Member please detail what actions have been taken, and how and when these have been communicated?"

Reply by MR TILBURY

"Storm Henk resulted in around 89 communities being impacted by flooding which in most cases was recorded as internal flooding. A total of 450 properties across the county were reported as internally flooded. As a result of Storm Henk, the Lead Local Flood Authority (LLFA) received a large number of enquiries from customers reporting flooding and asking for support and advice as well as answers and solutions. The LLFA logged all enquiries and responded as quickly as possible to any reports.

It is not always possible to respond directly to every member of the public where there are multiple reports of internal flooding, which may involve a number of actions and responsible bodies. In this instance, the LLFA would liaise with parish councils, local members and local flood action groups and request that updates are then shared by those bodies more widely.

Based on the current criteria for formal flood investigations, a large number of communities across the county triggered a formal investigation for Storm Henk. Due to the extent and magnitude of impacted communities and internally flooded properties, the LLFA took the decision to undertake one holistic formal Section 19 (S19) investigation covering all impacted communities across the county rather than producing separate investigation reports for each locality.

Within Mrs Bottomley's area, the village of Sileby was one of the locations that triggered a S19 investigation and is therefore included within the holistic S19 investigation and subsequent report to be published. The status of this investigation is viewable on the County Council's website.

With particular respect to Sileby, there were nine properties recorded as being internally flooded during Storm Henk. Since then, and in order to help inform the S19 investigation, the LLFA has coordinated a number of discussions with key Flood Risk Management Authorities (RMAs) and this has included Charnwood Borough Council as well as the Environment Agency (EA) and Severn Trent Water. A site visit was completed for Sileby on 14th June 2024 which included the local Flood Warden, Charnwood Borough Council, the LLFA and the EA.

While the S19 investigation report is yet to be published, it is clear that the main risk of flooding to Sileby is from the Main River for which the EA has the overarching responsibility. The EA has identified a number of key actions for Sileby of which are currently in progress. Whilst the LLFA has remained in frequent contact with the Parish Council and the Flood Warden for Sileby, in recognition of the concerns raised by the member, a summary of agreed actions and timescale will be discussed with the EA and shared with the community in due course.

In addition to this, following feedback from a recent flood drop-in event in Syston, it is proposed that a flood drop-in event is held in Sileby and the LLFA will coordinate this event to take place in the Autumn 2025."

(N) Question by MRS BOTTOMLEY

"Given the brief timeline given for Local Government Reorganisation, can the Leader confirm whether he is continuing to work on the previous Conservative administration's "one Leicestershire" plan, working with the district and boroughs on their "North, City, South" plan, or is planning an entirely different submission for consideration?"

Reply by MR D HARRISON

"I have looked at all the plans submitted in March, including the City Council's plan to which Mrs Bottomley does not refer. The focus from now on should be on what is best for the County and the City together."

(O) Question by MR BRAY

"The new Arriva LC14 service from Fosse Park to Hinckley will be welcomed by many people in Hinckley and other villages, however it will cause concern for businesses in the town centre. The loss of the 1 and 2 services serving Hinckley, Barwell and Earl Shilton has meant that many elderly people are no longer able to independently shop in town. Would the Leader please look at whether the County Council could utilise some of the external bus funding received to provide a shoppers' bus on market days that covers the estates in Hinckley, Barwell and Earl Shilton that were previously served by the 1 and 2 services. This will be a huge boost for Hinckley town centre and give back independence to local people - particularly elderly and disabled people who are unable to walk the distances to catch the 158 or 48 services."

Reply by MR WHITFORD

"The previous services 1 and 2 were commercially operated without subsidy from the Council and therefore, the removal of these services was a commercial decision by the operator due to a lack of patronage. In response to this and in line with our passenger transport policy and strategy we provided some bookable taxi based Demand Responsive Transport (DRT) services to ensure that those residents without access to an alternative bus service were provided for. The DRT service for Earl Shilton provides journeys to the centre of Earl Shilton and a similar DRT service is in place for Barwell.

Residents who are eligible to use both the Earl Shilton and Barwell DRT services, can travel on them to connect to bus services which will take them into Hinckley.

However, the Council is currently progressing a countywide passenger transport network review and as part of the upcoming phase of this review, we will take this feedback on board as we consider how best to utilise the Bus Service Improvement Plan funding in these areas to maximise provision and access to opportunities for residents.

Residents are very welcome to attend and provide their views at Choose How You Move roadshows (details of which can be found here https://www.choosehowyoumove.co.uk/public-transport/get-around-by-bus/leicestershire-buses/leicestershire-network-review/); their feedback can also be submitted online by emailing choosehowyoumove@leics.gov.uk team."

(P) Question by MR CHAPMAN

"As the Environment and Climate Change Overview and Scrutiny Committee is changing its name to the Environment and Flooding Overview and Scrutiny Committee, will climate change still be on the agenda for this Committee, as many believe that the increase in flooding is often seen as a consequence of climate change?"

Reply by MR D HARRISON

"Matters related to a changing climate and the associated impacts will fall under the remit of the Environment and Flooding Overview and Scrutiny Committee."

(Q) Question by MR PAGE

"After two months in office and having reviewed in full the state of the County's finances, what cuts in services is the Leader intending to make in order to fund his election promise to reduce council tax?"

Reply by MR D HARRISON

"As a new Administration, we are continuing the process of reviewing the state of the Council's finances inherited from the previous administrations over the last 24 years. We will need to consider the impact on the Medium Term Financial Strategy (MTFS) of the Government's Spending review and its potential

implications on the County Council's services and finances. No decisions on any potential service reductions or council tax levels have yet been made, as is the case with a rolling 4-year MTFS. Agreeing the County Council element of the council tax precept will be taken at the Budget meeting of the County Council on 18 February 2026."

AGENDA ITEM NO. 5
TO RECEIVE POSITION STATEMENTS FROM MEMBERS OF THE CABINET

There are no position statements.

AGENDA ITEM NO.6
REPORTS OF THE CABINET
(Pages 13 – 502)

Principal Speakers from the previous administration:
Mover of motion (Mrs Taylor)
Leader of the Opposition (Mr M Mullaney)

(A) LOCAL TRANSPORT PLAN 4

MRS TAYLOR will move and MR POLAND will second:

"(a) That subject to (b) below, the Local Transport Plan (LTP4) Core Document, attached as Appendix A to this report, be approved;

(b) That the Director of Environment and Transport, following consultation with the Cabinet Lead Member, be authorised to update the LTP4, including the focused strategies, Multi-Modal Area Investment Plans (MMAIPs), and the County Strategic Transport Investment Plan, as a result of evidence arising from the delivery of the LTP4 Core Document and consideration of future iterations of the Medium Term Financial Strategy."

(B) LOCAL NATURE RECOVERY STRATEGY

Principal Speakers:
Mover of the motion (as appropriate)
Leader of the Opposition (Mrs Taylor)

MR TILBURY will move and MR WHITFORD will second:

"That the Local Nature Recovery Strategy for Leicestershire, Leicester and Rutland be approved."

AGENDA ITEM NO. 7
REPORT OF THE CORPORATE GOVERNANCE COMMITTEE
(Pages 503 - 520)

Principal Speakers:
Chairman (Mr S L Bray)
Reform Spokesman (Mr G Cooke)
Conservative Spokesman (Mr J Orson)
Labour Spokesman (Mr J Miah)

(A) ANNUAL REPORT OF THE CORPORATE GOVERNANCE COMMITTEE

MR BRAY will move and MR COOKE will second:

"That the Corporate Governance Committee Annual Report 2024-25, attached to this report, be noted"

AGENDA ITEM NO. 8
REPORT OF THE SCRUTINY COMMISSION
(Pages 521 - 546)

Principal Speakers:
Chairman (Mrs D Taylor)
Liberal Democrat Spokesman (Mr M Mullaney)
Leader of the Council (Mr D Harrison)

(A) OVERVIEW AND SCRUTINY ANNUAL REPORT

MRS TAYLOR will move and MR MULLANEY will second:

"That the information contained in the Overview and Scrutiny Annual Report 2024-25, appended to this report, be noted."

AGENDA ITEM NO. 9
REPORT OF THE CONSTITUTION COMMITTEE
(Pages 37 - 48)

Principal Speakers:
Chairman (Mr D Harrison)
Conservative Spokesperson (Mrs D Taylor)
Liberal Democrat Spokesman (Mr M Mullaney)

(A) REVIEW OF THE CONSTITUTION

MR D HARRISON will move and MRS TAYLOR will second:

"That the proposed changes to the terms of reference of the Council's Overview and Scrutiny Committees, as set out in the Appendix to this report, and any

consequential amendments to the Constitution required as a result of these changes, be approved."

AGENDA ITEM NO.10
NOTICES OF MOTION

(A) LOCAL GOVERNMENT REORGANISATION

MR MULLANEY will move and MR BRAY will second:

"Following the outcome of the election in which the Conservatives lost their majority fighting on a platform of one unitary authority for the whole of Leicestershire this County Council resolves to:

(a) Withdraw the bid with the Government for one unitary authority for the whole of Leicestershire and support the proposals from the Borough and District Councils and Rutland County Council for two Unitary authorities for Leicestershire (a North and a South);

(b) Record its objection to any proposal that would involve parts of the County of Leicestershire being taken over by an enlarged Leicester City Authority."

An amendment will be moved by MR D HARRISON and seconded by MR BOAM

"That:

(i) following advice from chief officers on the proposals for local government reorganisation (LGR) from the district councils and Rutland, which include a proposed north/south split of the county, the County Council believes that the proposal if implemented:

(a) would lead to a significant risk to the stability of countywide services, particularly social care.

(b) would also cause unnecessary disaggregation of services leading to cost increases, duplication and reduced economies of scale for upper tier functions such as highways, waste disposal and social care.

It is also noted that:

(c) the County Council was informed by the leaders of the district councils and Rutland at a meeting in January 2025 that, following earlier meetings to which the County Council had not been invited, those leaders supported a unitary authority for Leicester with an extended boundary and two unitary authorities for the remaining area of Leicestershire and Rutland.

(d) the County Council under the previous administration changed its position when the Government refused a request to delay elections

to join the fast-track LGR programme to unlock devolution.

(e) the County Council is not aware that the district councils and Rutland have changed their position from January 2025 but are currently carrying out a 'public engagement' exercise on a proposal which does not support an extended City boundary.

(ii) the County Council believes it is important to be open and transparent in the LGR process.

(iii) the County Council is therefore unable to support the proposals from the district councils and Rutland for two unitary authorities for Leicestershire, which would create unviable new authorities, contrary to Government requirements as set out in the Devolution White Paper that new unitary councils must be the right size to achieve efficiencies, improve capacity and withstand financial shocks.

(iv) the County Council is having constructive discussions with the City Council and there is joint agreement that the best option for LGR in Leicester and Leicestershire is a two unitary model, one City, one County, that both authorities must be financially sustainable with the capacity to enable strategic land use planning across City and County, providing the optimum structure for devolution of powers, responsibilities and funding.

(B) <u>SPENDING REVIEW</u>

With the consent of the Council, MR MULLANEY will move and MRS PENDLEBURY will second the following altered motion:

"In the interests of seeking a way forward which we can all support and in recognition of the omission of the Chancellor to address issues in Leicestershire in either the Budget or the Spending Review, this Council resolves to make representation to the Government in order to persuade it:

"(i) To provide fair funding for the County Council as Leicestershire remains rooted at the bottom of the league;

(ii) To provide adequate resources for the maintenance of the three emergency services in the County, Fire, Police and Ambulance, all of which are profoundly under funded;

(iii) To outline the action it intends to take to tackle continuing flooding problems;

(iv) To address the issue of retention, recruitment and improvements in the NHS and Social Care across the County;

(v) To bring forward an early programme to road and rail schemes across the County including the A5, Junctions 21 and 24 of the M1, the A46 Hobby Horse Island and the long promised Coventry – Leicester rail project."

Environment and Transport – Commissioning Framework

Enderby Village Microsim

Modelling Report

15 December 2017
3899.005

Leicestershire County Council

Leicestershire County Council

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Leicestershire County Council

1. Document Sign-off

1.1. Control Details

Document Location:	K:\TMODELLING\07. 3899 Market Town Microsimulation\3899.005 Enderby Village - August 2017\06. Deliverables
Production Software:	Microsoft Word 2010
Owner:	Alex Gray, Network Data and Intelligence Team

1.2. Document history and status

Ver	Date	Description	Author	Review	Approved
0.1	24/11/17	Draft for internal review	CH	RB	
0.2	28/11/17	Draft version for release to the client	CH	RB	TB
1.0	15/12/17	Final Version	CH	RB	TB

1.2.1. This document has been prepared by Leicestershire County Council for the sole use of our client (the "Client") and in accordance with the terms and conditions of service provision under the Transport Modelling & Planning Framework, the budget for fees and the terms of reference agreed between Leicestershire County Council and the Client. Any information provided by third parties and referred to herein has not been checked or verified by Leicestershire County Council, unless otherwise expressly stated in the document. No third party may rely upon this document without the prior and express written agreement of Leicestershire County Council.

1.2.2.

1.2.3. Whilst the modelling work outlined in this report has been carried out using the Leicester and Leicestershire Integrated Transport Model (LLITM), its findings and any conclusions do not necessarily represent the views of Leicestershire County Council as the Highway Authority.

Leicestershire County Council

2. Overview

2.1. Introduction

2.1.1. Network Data and Intelligence (NDI) has been commissioned to produce a microsimulation model of Enderby village.

2.1.2. The Enderby village microsimulation model will be used to test a proposed traffic management scheme within the village.

2.1.3. The Enderby microsimulation model has been created from a number of Manual Classified Turning Counts which have been collected in July 2017; therefore giving a 2017 base model. As such the 2017 highway network has been used to code the existing roads into the model.

2.1.4. The model has been developed for the 2017 base year weekday morning and evening peak periods (0800 to 0900 and 1700 to 1800). Quarter hour “warm-up” and “cool-down” periods have also been included to add some traffic onto the network prior to the peak period and also to allow journeys to complete after the simulation period.

2.1.5. The study area of the model is shown in Figure 2.1 below.

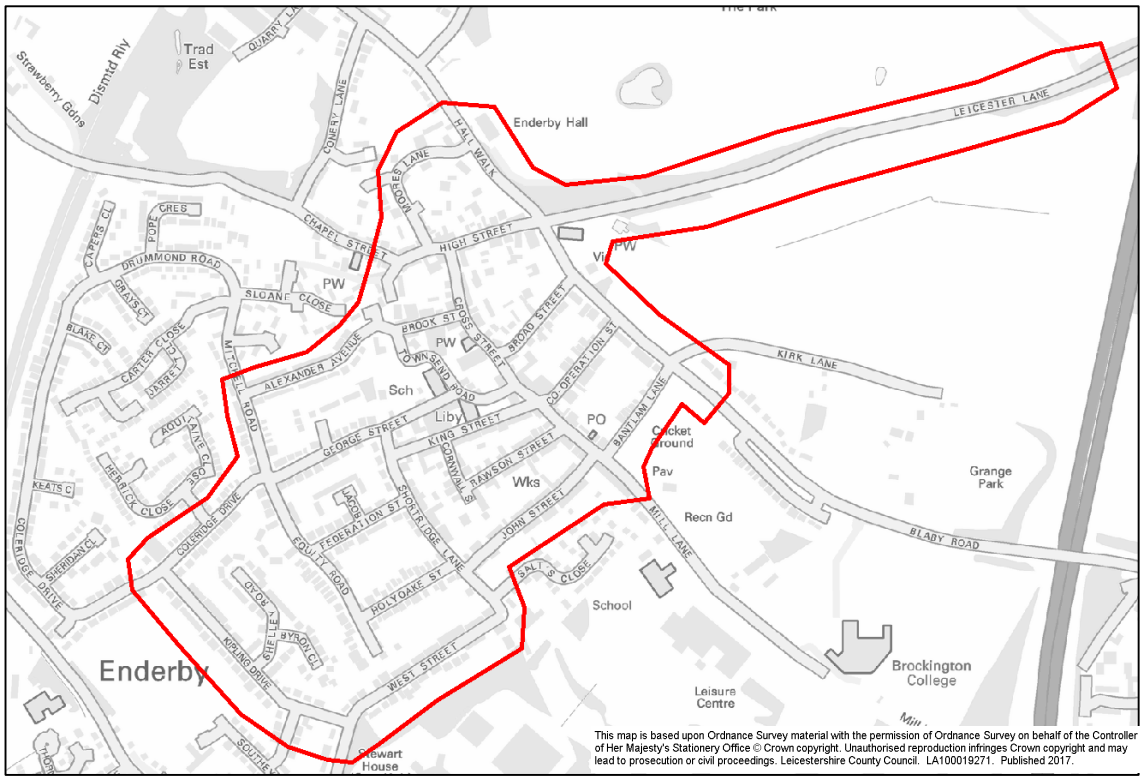

Figure 2.1 Study area of the Enderby village Microsimulation Model.

3. Data Collection

3.1. Methodology

3.1.1. In order to create the microsimulation model, an extensive data collection exercise was undertaken in which Manual Classified Turning Counts were observed at all key and many minor junctions within the study area. A total of 29 sites were surveyed in July 2017, predominantly on one common day with the data being classified into the following vehicle classes:

- Car
- Motorcycle
- Passenger Service Vehicle
- Light Goods Vehicle
- Other Goods Vehicle 1
- Other Goods Vehicle 2
- Pedal Cycle

3.1.2. Figure 3.1 shows the locations of the surveyed sites whilst Table 3.1 contains a comprehensive listing of each.

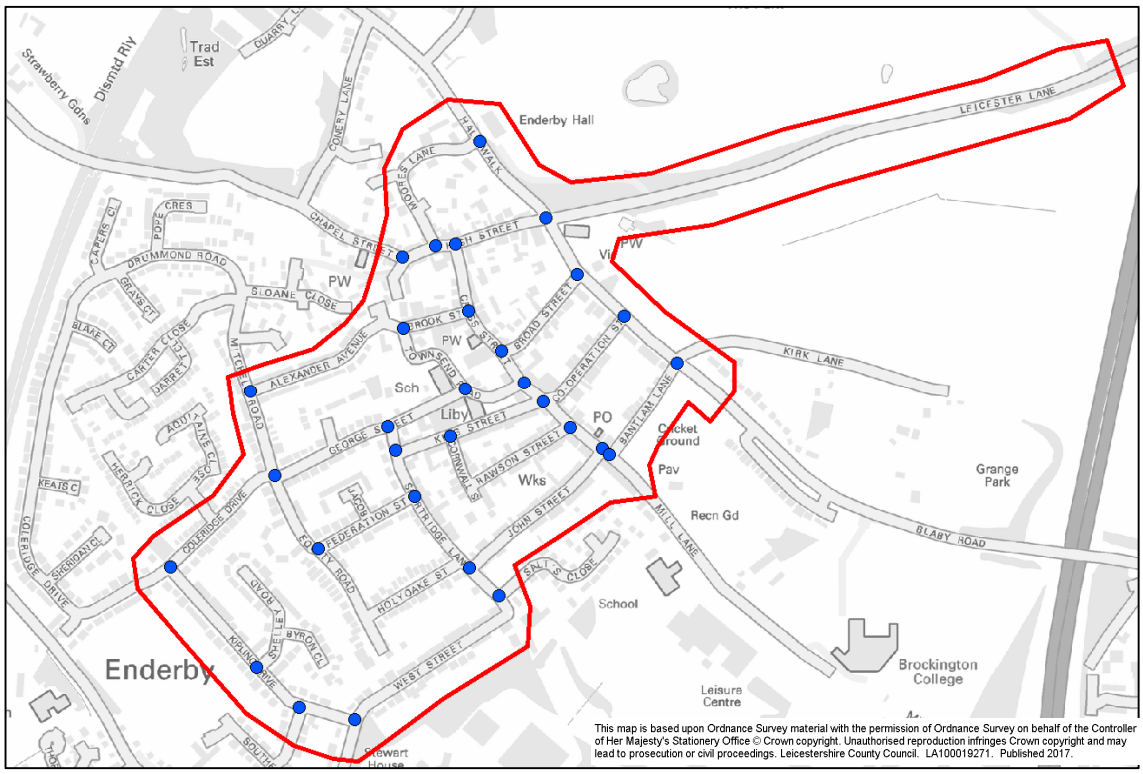

Figure 3.1.1 Spatial location of Manual Classified Turning Count sites in Enderby.

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No	Location Description	Type
107048	Hall Walk/Moores Lane	MCC
107051	Leicester Lane/B582/High Street	MCC
107054	High Street/The Cross	MCC
107059	High Street/Moores Lane	MCC
107062	High Street/Chapel Street	MCC
107065	B582/Broad Street	MCC
107068	B582/Co-Operation Street	MCC
107071	Kirk Lane/B582/Bantlam Lane	MCC
107074	Mill Lane/Bantlam Lane/John Street	MCC
107080	Mill Lane/Rawston Street	MCC
107083	Co-Operation St/Mill Ln/King St/Cross St	MCC
107086	Cross Street/ Townsend Road	MCC
107089	Cross Street/Broad Street	MCC
107092	Cross Street/Brook Street	MCC
107095	Shortridge Lane/Salts Close	MCC
107098	Shortridge Lane/John Street	MCC
107101	Shortridge Lane/Holyoake Street	MCC
107104	Shortridge Ln/Federation Street	MCC
107107	King Street/Cornwall Street	MCC
107110	Shortridge Lane/King Street/George Street	MCC
107113	George Street/Townsend Road	MCC
107116	Alexandra Ave/Townsend Rd/Brook Street	MCC
107119	Mitchell Road/Colbridge Drive/ Alexandra Avenue	MCC
107247	Kipling Drive/West Street/Stewart Avenue	MCC
107250	Kipling Drive/Shelley Road	MCC
107253	Coldridge Drive/Kipling Drive	MCC
107256	Kipling Drive/Masefield Road	MCC
107471	Federation Street/Equity Road	MCC
107474	Alexander Ave/Mitchell Road	MCC

Table 3.1.1 Counts Collected in the development of the Enderby Village Microsimulation model.

4. Model Development

4.1. Highway Network

4.1.1. Loading points have been added to the model. In the majority of cases these loading points coincide with a real life junction (such as cul-de-sac or car park entrance). Where there is no appropriate real life junction, an artificial loading point has been added.

4.1.2. As part of the highway network, lane markings, conflict areas and priority rules have been included as per satellite imagery. Speed limits and reduced speed zones have been added to match real life traffic conditions. The construction of the physical highway network is identical between the AM and PM peak period models. Costs and surcharges have been added to certain routes, often rat-runs or routes with high street parking, to make these routes less favourable and therefore attract fewer trips. Signal timings also differ between the AM and PM peak periods.

4.1.3. A plan showing the extent of the Enderby Village Microsimulation Models highway network can be found in figure 4.1.1.

Figure 4.1.1 Enderby Village Microsimulation Model's highway network.

4.2. Signal Timings

4.2.1. In the Enderby Village Microsimulation Model there is one signalised junction, at Hall Walk, Blaby Road and Leicester Lane. The signal timings have been supplied from the Leicester and Leicestershire Transport Model, with additional time given to account for pedestrian movements. The signal timing sheets for the AM and PM peak periods can be found in figures 4.2.1. and 4.2.2. respectively.

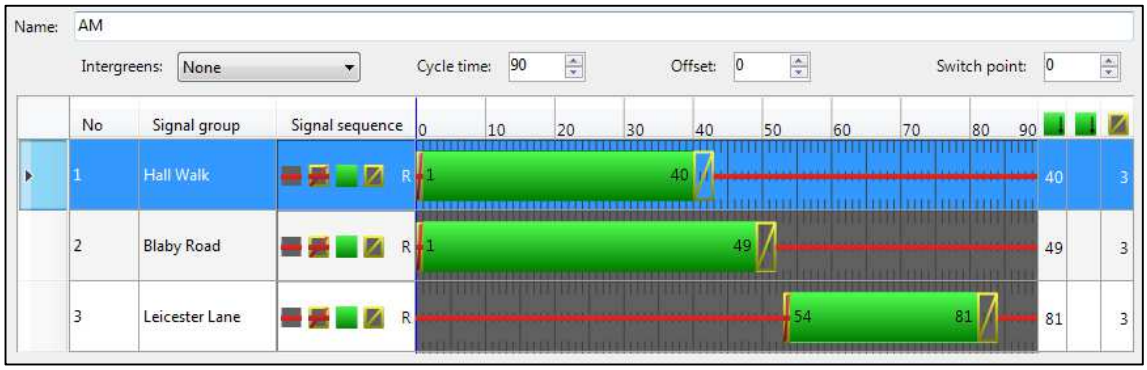

Figure 4.2.1 AM peak period signal timings

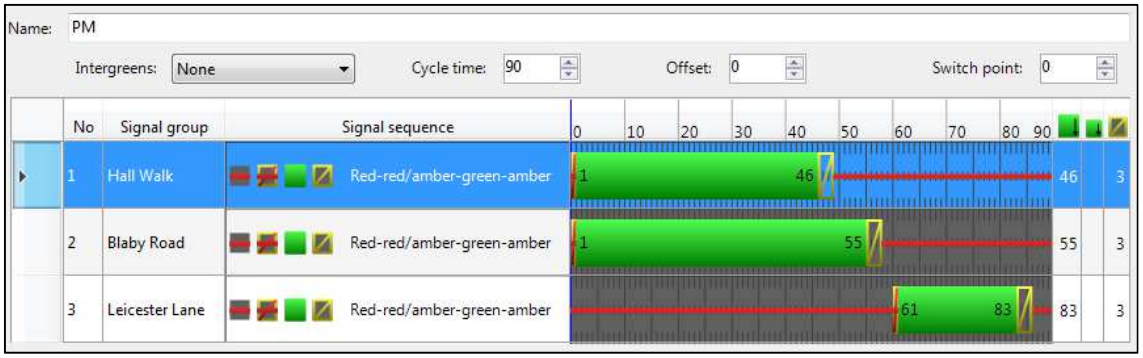

Figure 4.2.2 PM peak period signal timings.

4.3. Passenger Transport

4.3.1. Bus route 50 serves Enderby with Narborough to the south and Leicester to the north. During peak periods there is one bus every 20 minutes in each direction. The bus route and timetable has been coded into the model to represent reality. Bus stops have also been situated in the appropriate location. A map of the bus routes can be found in figure 4.3.1. A list of stops in the model can be found in table 4.3.1 (note- in the model the bus service will stop for a period of 9 seconds at every stop – this is a default value which has been assumed as the average stop and dwell time at all stops, no matter if passengers are alighting/boarding the bus at the particular point).

Figure 4.3.1 Current existing and modelled bus route through Enderby village. Top left: Southbound (towards Narborough). Top Right: Northbound (towards Leicester). Bottom left: Southbound (towards Narborough). Bottom Right: Northbound (towards Leicester).

Number	Stop	Direction
1	Opp Co-op Street	Northbound
2	Adj Co-op Street	Southbound
3	Opp Cross Street	Southbound
4	Adj Cross Street	Northbound
5	Adj Federation Street	Northbound
6	Opp Herrick Close	Northbound
7	Adj Herrick Close	Southbound
8	Adj Shelley Road	Southbound
9	o/s West Street	Southbound
10	Adj Shortridge Lane	Southbound
11	Opp Shelley Road	Northbound

Table 4.3.1 List of bus stops in the Enderby Village Microsimulation Model.

Figure 4.3.2 Location of bus stops in the network

4.4. Matrix Estimation

4.5. Zoning System

4.5.1. In order to model the desired level of detail, the area of interest has been split into 37 zones which are the source and destination of trips in the model. Each zone has a zone connector which is where physical trips either enter or exit the network.

4.5.2. Zones in and out of the modelled area are given the name A-E. Zones which involve trips with an origin and/or a destination within Enderby are given a name between F1 and F31. Generally speaking there is a higher density of zones in the village centre; however the exact extent of each zone has been determined through examination of the data collection results along with manual judgement.

4.5.3. The spatial distribution of zones can be found in figure 4.5.1.

4.5.4. The zones are used to form a trip matrix, the method of how the matrices are produced is outlined in section 4.6.

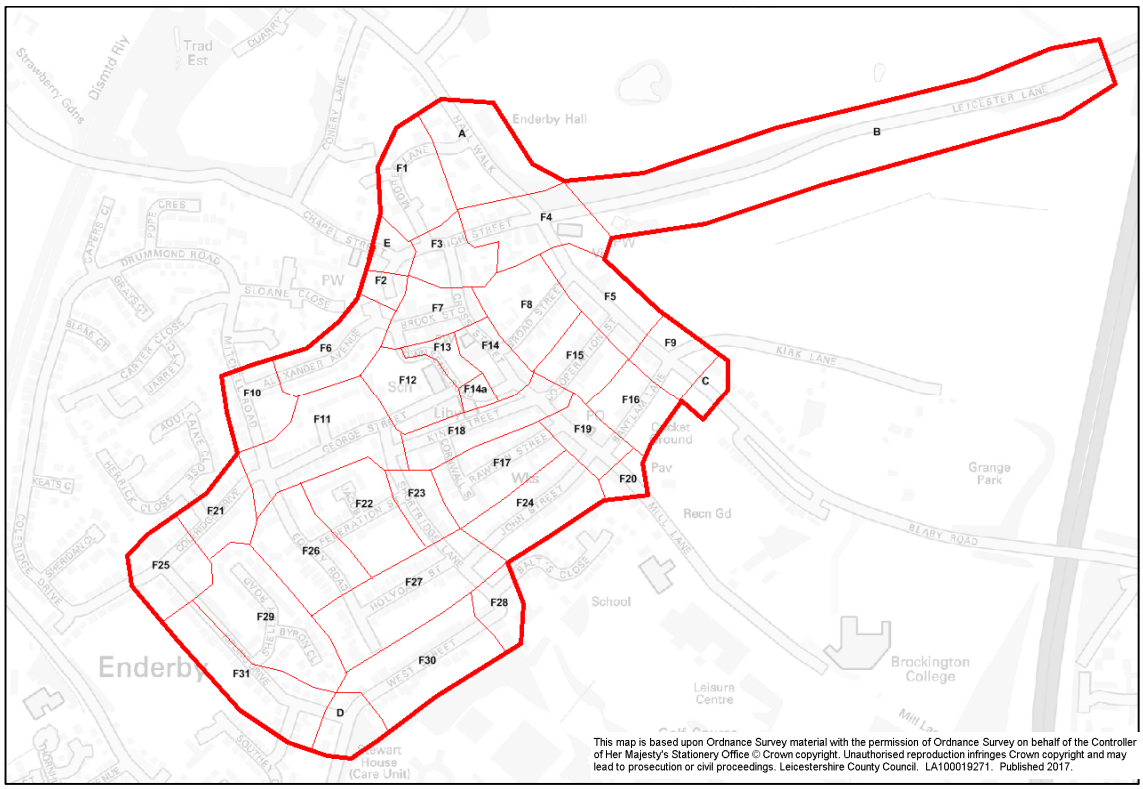

Figure 4.5.1 Spatial distribution of zones within the Enderby Village Microsimulation Model.

4.6. Matrix Estimation Algorithm

4.6.1. The Matrix Estimation (ME) process uses a bespoke script developed by AECOM to run Matrix Estimation in VISSIM. This enables assignments within VISSIM to be used within the process, rather than conducting ME in another software package and then assigning in VISSIM, which would not work as effectively.

4.6.2. The script was developed in Python and implements the “gradient method”. An accepted algorithm for adjusting matrices to reflect counts is the “gradient method”, documented in “A Gradient Approach for the O-D Matrix Adjustment Problem”, Spiess, 1990. It is not the only well-used matrix estimation algorithm – however, algorithms generally share two basic principles:

- the revised matrix should reproduce the observed flows as well as possible; and
- the revised matrix should resemble the original matrix as well as possible.

4.6.3. Algorithms differ in the relative weights they place on the two points, as well as in how, “as well as possible”, is defined for each and whether some counts and/or origin-destination pairs are weighted more highly than others. Matrices are produced for three user classes: Cars, LGVs and HGVs.

4.6.4. The gradient method aims at each step to make minimal adjustments to the matrix to achieve a given improvement in flow comparison by seeking the path of steepest descent.

4.6.5. Before starting the ME process, the prior matrix is assigned to the meso model and the model run to convergence to discover all possible paths between OD pairs. Once the meso model has converged, cost and path files are used to run a prior matrix assignment in the micro model with an imposed restriction of up to 3 paths per OD pair. Using these paths the micro model is run to convergence to reveal the best 3 paths between each OD pair and it is these cost and path files that form part of the necessary input to the ME process.

4.6.6. The final required input to the ME process is a starter, or prior, trip matrix. Unfortunately, there is not an ‘off the shelf’ prior matrix available and so one has been derived using the 2016 forecast year matrix from the Leicester and Leicestershire Integrated Transport Model (LLITM) to inform the movements of the external zones - A-E (via a series of select link analysis) and internally a flat matrix of 0.1 has been used for zones F1-F31. The matrix assumes a “flat release distribution” across the peak hour and warm up/cool down periods.

4.6.7. Count data from strategically important links within the model has then been input into the AECOM algorithm, which then attempts to match the observed counts with modelled flows.

4.6.8. A description of the full algorithm is as follows:

i. A single standard assignment is performed to generate flows. All following network calculations are performed only on links/nodes/segments that actually have counts; other links are ignored.

ii. The “gradient" is calculated for each link, segment or node with a count, using the following function:

$$G = \lambda(ObservedCount - ModelFlow)$$

where λ is a chosen small number; 0.01 is used in LLITM-PT.

iii. The “objective function” Z is calculated for the network as a whole, as

$$Z = \sum \lambda(ModelFlow - ObservedCount)^2$$

where λ is the same number as before. This is not used in the rest of the process but is a measure of convergence.

iv. A “gradient matrix” is computed. This matrix gradient is called g.

v. The gradient matrix is multiplied by demand to get a demand adjustment. A new assignment of this demand adjustment is performed to produce new flows. This assignment uses the same routes as i, with only the demand by zone-pair changed. It does not recalculate congestion and re-evaluate routes. Note that this step will require the assignment of negative demand, since the adjustments will sometimes be negative.

vi. The maximum absolute ratio of adjusted to new demand is calculated by matrix cell, that is to say, the maximum matrix-level gradient is calculated. Negatives become positive.

vii. The “optimal step length” is calculated as a network calculation as follows, using the maximum G calculated in step 6. The flows used here are those derived from step 5, not the current “real” assignment flows.

$$StepLength = \sum \left(\frac{G}{\lambda}\frac{Flow}{\sum Flow^2}\right) Max(|g|)$$

viii. If the step length is greater than 1, it is set to 1.

ix. A new demand matrix is calculated as follows:

$$NewDemand = PreviousDemand\left(1 + StepLength\left(\frac{g}{Max(|g|)}\right)\right)$$

x. A decision is made on whether to stop or not (based on number of iterations, value of objective function, or some other convergence measure). If the process is not halted, it goes back to step 1, using the new demand matrix calculated in step 9 in place of the original matrix.

The ME process follows the following procedure;

- Mesoscopic: Run the model from 50% to 100% in mesoscopic simulation (2.5 increment);
- Mesoscopic: Run the model until reaches convergence (criteria shown in Table 4-2);
- Microscopic: Run the model with the same volumes on paths to extract volumes; and
- Run matrix estimation python script to generate new matrix; and
- Check modelled flows against observed flows to see if GEHs <5 are falling further.

The ME process produces up to 300 matrices; of which 3 are used for further modelling (one for each mode). Due to the lack of a reliable prior matrix it is often useful to manually "massage" the matrices in order to gather more accurate results – this may involve redistributing trips between zones or adding additional zones. When massaging the matrix, observed count evidence can be used to inform decisions. Once manually changed, the matrices can then go through the ME process again in order to create an enhanced matrix.

The matrices have been produced assuming the demand on the network is solely loaded as "dynamic assignment" trips. Dynamic assignment allows for individual vehicles having route choice in order to complete their journey. For Car trips between zones A, B and C, dynamic assignment has been withdrawn and trips between these zones are manually assigned (and therefore do not have route choice). This is because when running the model, trips from these zones were observed making illogical movements through the network to avoid the Hall Walk, Leicester Lane, Blaby Road, High Street Crossroads. This often resulted in the model becoming oversaturated which has severe consequences for the network. The majority of paths on the network remain coded in Dynamic assignment, meaning that each vehicle on the network makes its own route choice. A summary of the final Car matrix can be found in figure 4.6.1.

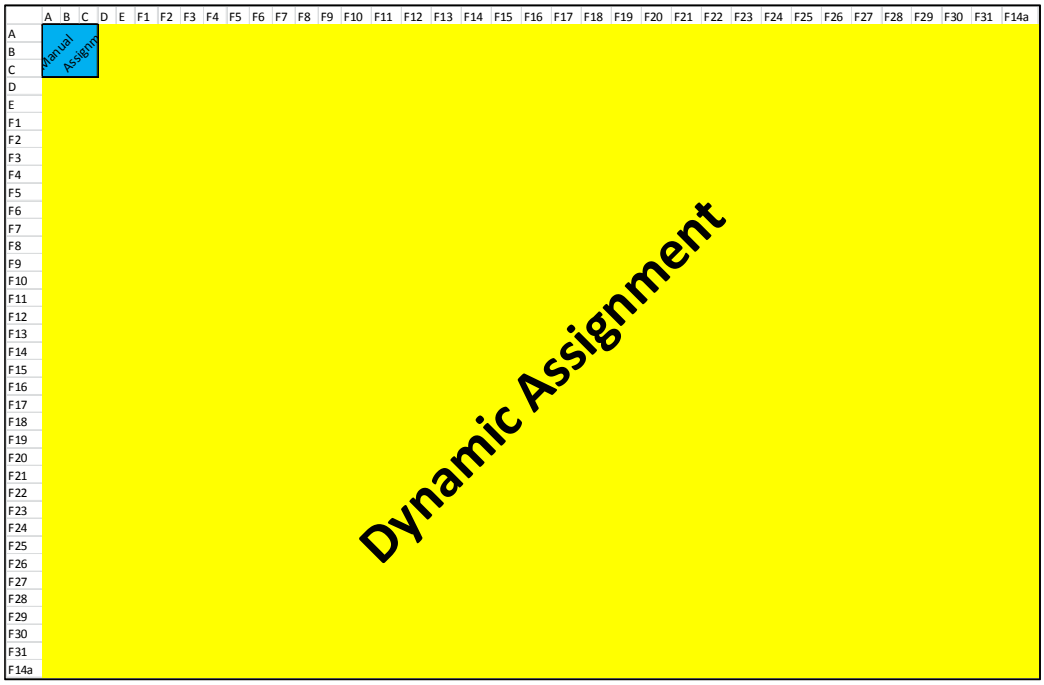

Figure 4.6.1 Summary of the Car matrices produced for the Enderby Village Microsimulation.

5. Model Calibration and Validation

5.1. Calibration

5.1.1. The models were calibrated in an iterative manner, whereby priority rules, reduced speed areas, vehicle behaviour and signal timings were adjusted based on the prevailing flow data and observations of traffic conditions, before running additional iterations of Matrix Estimation to calibrate the demand matrices. This process is summarised in figure 5.1.1.

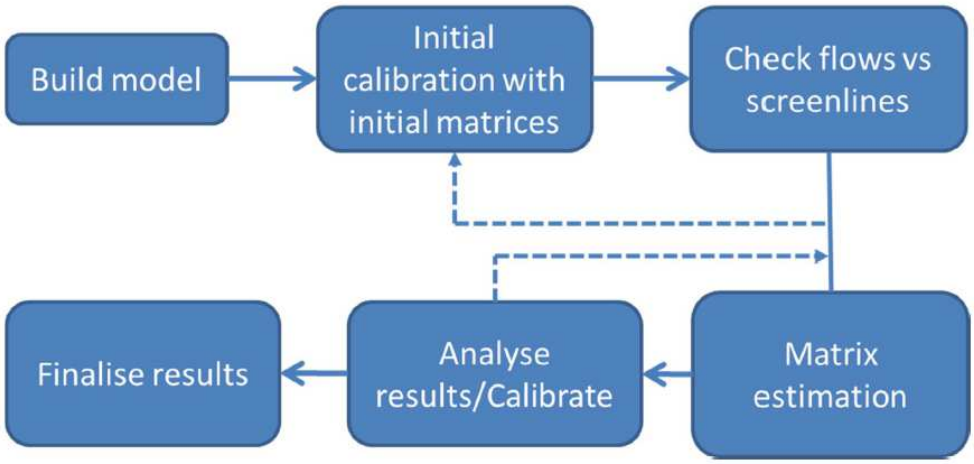

Figure 5.1.1 Overview of calibration process

5.1.2. Flow calibration is a process whereby modelled flow output are compared and calibrated to match observed traffic flows within a network. In the development of the Enderby Village Microsimulation Model, flow calibration has been undertaken on links at 10 key sites around the village. The sites chosen for calibration can be viewed in figure 5.1.2. For each of these sites the modelled flow was compared to the observed flow on each link and turning movement as part of the ME process.

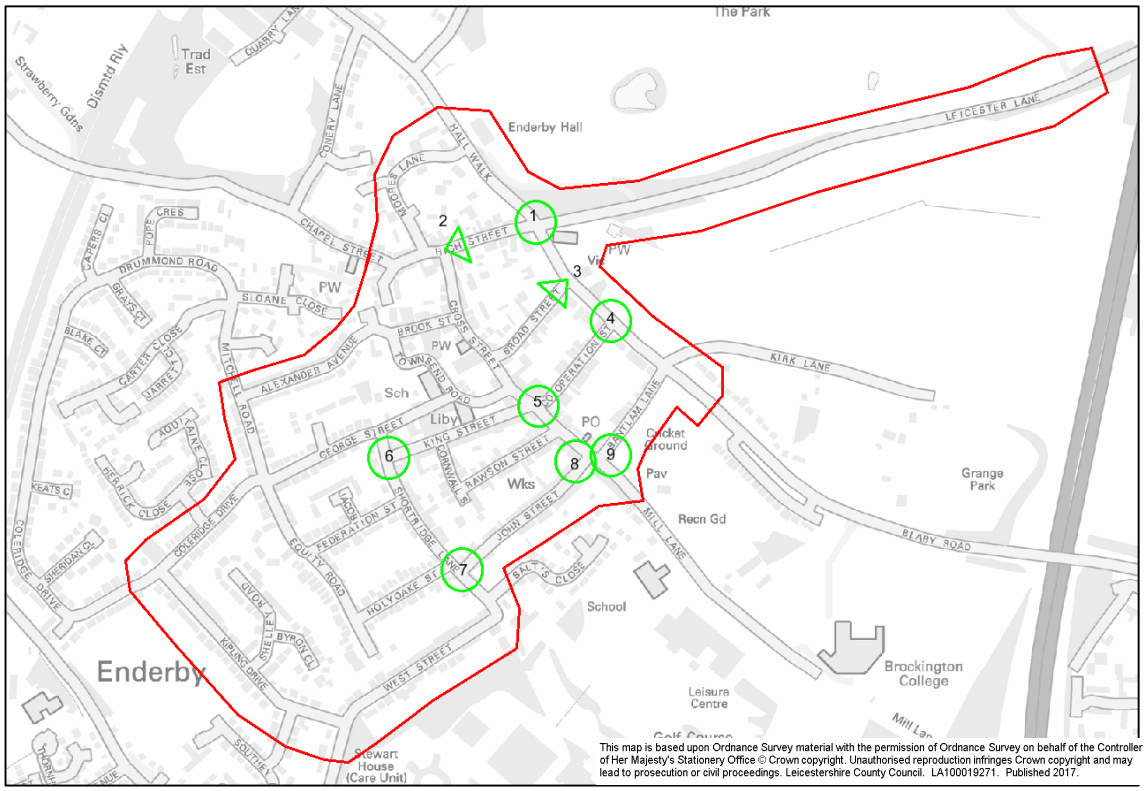

Figure 5.1.2 Locations used to calibrate the model.

5.1.3. In addition to flow calibration, delays and journey times have also been monitored as part of the model calibration process. The results from this analysis can be found on section 6.2.

5.2. Validation

5.2.1. Screenline validation has been undertaken to validate the Enderby Village Microsimulation Model. Four screenlines have been created and the number of vehicles crossing each screenline is monitored in each core scenario. A plan showing the screenlines can be found in figure 5.2.1.

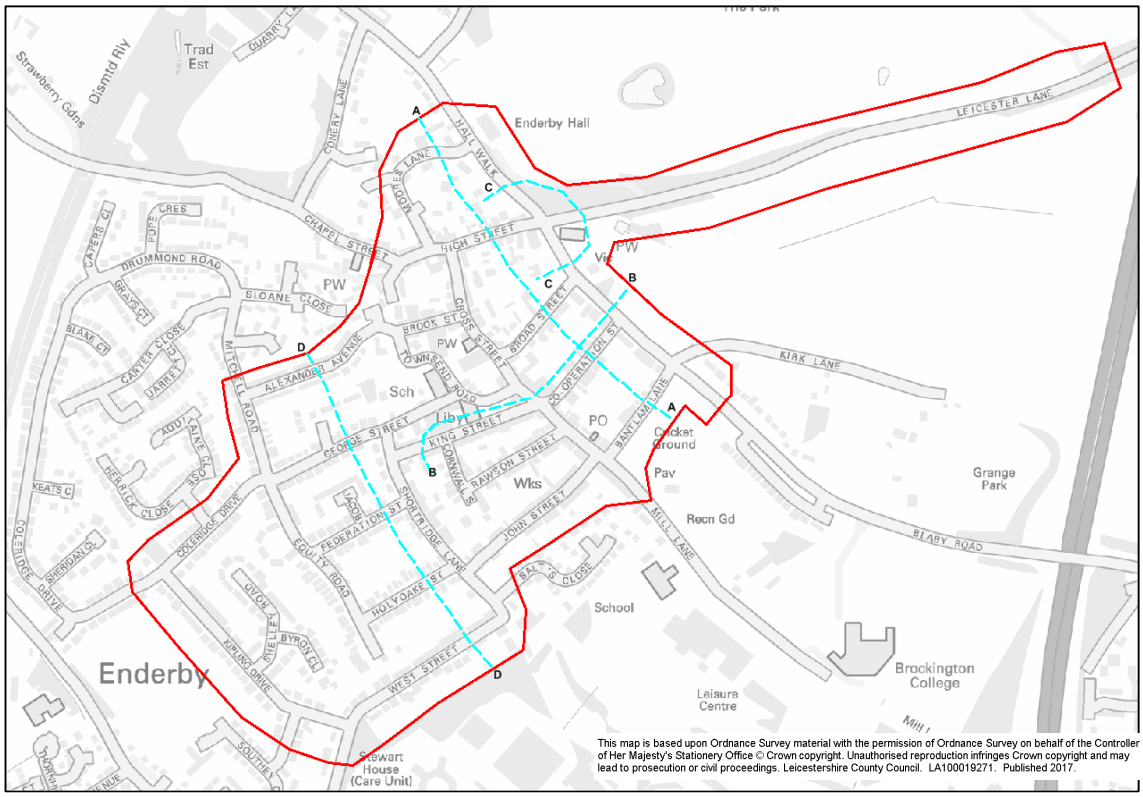

Figure 5.2.1 Validation Screenlines used in the development of the Enderby Village Microsimulation Model.

5.3. WebTAG Calibration and Validation guidelines

5.3.1. The WEBTAG calibration and validation guideline criteria have been applied to the Enderby Village Microsimulation Model and can be seen in this section.

5.3.2. WebTAG dictates the margin of error acceptable within a model. However, it should be noted that the guidance in WebTAG is produced for macroscopic models, typically covering larger areas, containing many more trips, with a sparser coverage of count data.

5.3.3. The relevant WebTAG guidance which applies to this model can be found in figures 5.3.1. and 5.3.2.

Link Flow and Turning Movement Validation

3.2.7 For link flow validation, the measures which should be used are:

- the absolute and percentage differences between modelled flows and counts; **and**
- the GEH statistic, which is a form of the Chi-squared statistic that incorporates both relative and absolute errors, and is defined as follows:

$$GEH = \sqrt{\frac{(M-C)^2}{(M+C)/2}}$$

where: GEH is the GEH statistic;

M is the modelled flow; and

C is the observed flow.

These two measures are broadly consistent and link flows that meet either criterion should be regarded as satisfactory.

3.2.8 The validation **criteria** and **acceptability guidelines** for link flows and turning movements are defined in Table 2.

Table 2 Link Flow and Turning Movement Validation Criteria and Acceptability Guidelines

Criteria	Description of Criteria	Acceptability Guideline
1	Individual flows within 100 veh/h of counts for flows less than 700 veh/h	> 85% of cases
	Individual flows within 15% of counts for flows from 700 to 2,700 veh/h	> 85% of cases
	Individual flows within 400 veh/h of counts for flows more than 2,700 veh/h	> 85% of cases
2	GEH < 5 for individual flows	> 85% of cases

WebTAG Unit M3.1

Figure 5.3.1 WebTAG link flow and turning movements guidelines

Table 1 Screenline Flow Validation Criterion and Acceptability Guideline

Criteria	Acceptability Guideline
Differences between modelled flows and counts should be less than 5% of the counts	All or nearly all screenlines

WebTAG Unit M3.1

Figure 5.3.2 WebTAG flow screenline guideline

5.4. WebTAG Calibration and Validation Results

5.4.1. Full calibration and validation results can be found in Appendix 1. This section presents a summary of the results.

Calibration Summary	AM	PM
Link Compliance	19/24 (79%)	22/24 (92%)
Turning Compliance	50/55 (91%)	52/55 (95%)

Table 5.4.1 Summary of the calibration results

Time	Screenline	Direction	Observed Count	Model Flow	% Difference
AM	A	Eastbound	569	448	-21
		Westbound	312	386	+24
		Overall	**881**	**834**	**-5**
	B	Northbound	1140	1235	+8
		Southbound	388	383	-1
		Overall	**1528**	**1618**	**+6**
	C	To Junction	1876	1927	+3
		From Junction	1821	1805	-1
		Overall	**3697**	**3692**	**+0**
	D	Eastbound	475	361	-24
		Westbound	165	134	-19
		Overall	**640**	**495**	**-23**
PM	A	Eastbound	400	375	-6
		Westbound	549	547	0
		Overall	**949**	**922**	**-3**
	B	Northbound	791	849	+7
		Southbound	685	727	+6
		Overall	**1476**	**1576**	**+7**
	C	To Junction	1806	1995	+10
		From Junction	1655	1827	+10
		Overall	**3461**	**3822**	**+10**
	D	Eastbound	284	342	+20
		Westbound	405	530	+31
		Overall	**689**	**872**	**+27**

Table 5.4.2 Summary of the screenline validation results

5.4.2. Although not all base models meet the full WebTAG guidelines, however the models have still achieved an acceptable level of calibration and validation. In general the calibration sites comply very well to the guidelines. The screenlines generally perform better in the Enderby village centre area.

5.4.3. Despite not complying to all of the WebTAG guidelines, it is considered that the level of calibration and validation is such that the model provides a robust starting point for testing schemes in the Do Something Scenario.

6. Model Outcomes

6.1. Observed traffic conditions

6.1.1. The contents of this section are designed to describe how the model behaves during the relevant peak period.

6.1.2. The AM peak sees high demand through the Hall Walk, Leicester Lane and Blaby Road junction, with large queues developing in all directions throughout the peak period. This can be seen in figure 6.1.1. The observation in the model matches what is experienced on the ground.

6.1.3. In the AM peak there also periodic queues observed on North-East bound movements within Enderby Village, with traffic attempting to get onto Blaby Road. Generally the largest queues can be found on Co-Operation Street, however there are also queues observed along Broad Street and Bantlam Lane. This situation is captured in figure 6.1.2.

6.1.4. Figures 6.1.3. and 6.1.4. show the most trafficked links and the average speed on links respectively. Perhaps unsurprisingly links along Hall Walk, Leicester Lane and Blaby Road carry the highest volume of trips. Many links within Enderby Village are lightly trafficked; there is a noticeable movement through the village to/from south west to the east. The average speed along links can provide insight as to where congestion is occurring, and with this in mind the key junction at Hall Walk, Leicester Lane and Blaby Road flags up as having a low average speed. Much of the village area is speed restricted to around 20mph to take into account for observed traffic conditions. However it is still clear that there are delays along Co-Operation Street and other parallel links approaching Blaby Road.

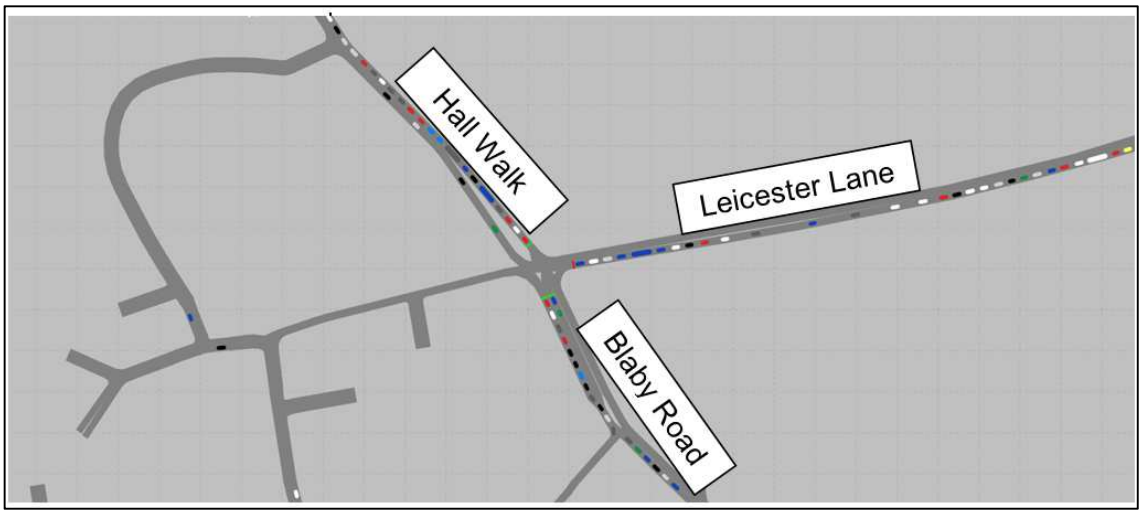

Figure 6.1.1 AM peak period queuing observed at the Hall Walk, Leicester Lane and Blaby Road junction

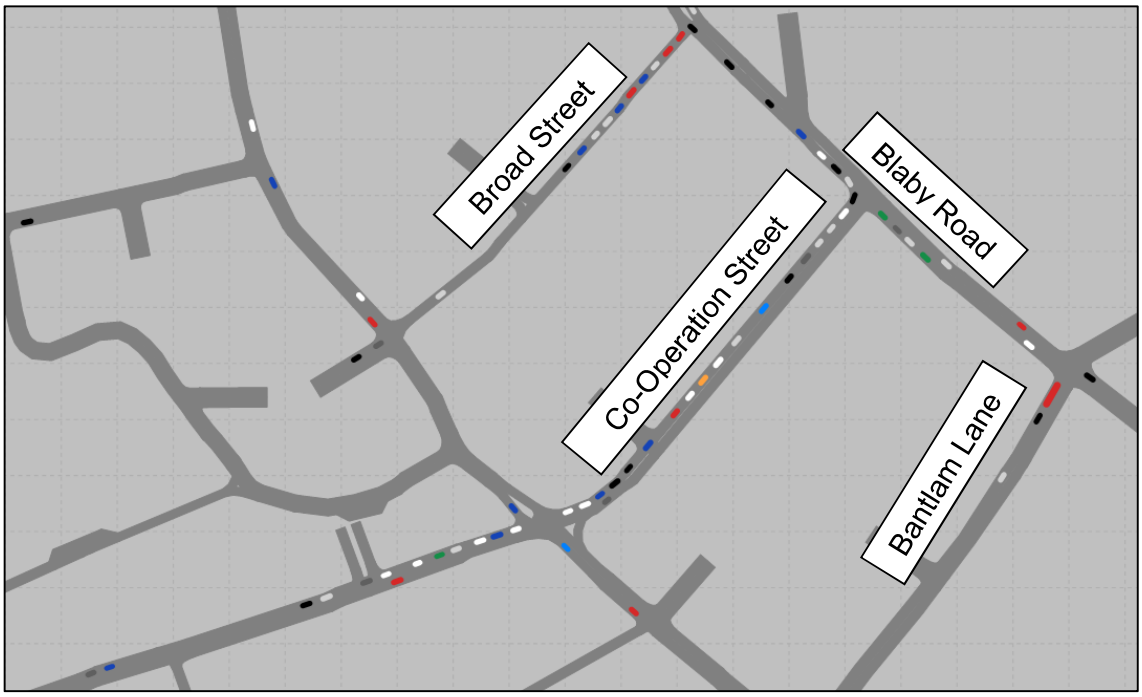

Figure 6.1.2 Queuing traffic observed on village roads during the AM peak.

Figure 6.1.3 AM peak hour traffic flow distribution (vehicles/hour)

Figure 6.1.4 AM peak hour average speed (KM/H)

6.1.5. In the PM peak there are also queues present at the Hall Walk, Leicester Lane and Blaby Road junction; the largest of which appear on Leicester Lane approaching the junction. Inside the village there is very little queueing, and where there is it is usually confined to Co-Operation Street and parallel links. A summary of the traffic situation around the congested Hall Walk, Leicester Lane and Blaby Road junction is found in figure 6.1.5.

6.1.6. The PM peak model has a similar flow distribution to the AM model, with the highest flows confined to Hall Walk, Leicester Lane and Blaby Road. There is also a noticeable flow to/from south west Enderby up to routes onto Blaby Road. The flow distribution plan can be seen in Figure 6.1.6.

6.1.7. Figure 6.1.7.shows the average speed of vehicles travelling on the Enderby Village network. The PM network generally appears to have a higher average speed on most links than the AM equivalent. However there are still low speeds prevalent on links approaching the Hall Walk, Leicester Lane and Blaby Road junction. Much of the village area is speed restricted to around 20mph to take into account for observed traffic conditions. However it is still clear that there are delays along Co-Operation Street and other parallel links approaching Blaby Road.

Figure 6.1.5 Typical PM peak hour traffic conditions at the Hall Walk, Leicester Lane and Blaby Road junction.

Figure 6.1.6 PM peak hour traffic flow distribution (vehicle/hour)

Figure 6.1.7 PM peak hour average speed (KM/H)

6.2. Journey Time Analysis

6.2.1. An additional assessment of journey times has been undertaken to provide a numerical comparison between this, the core scenario, and the do something scenario. Measurements from the model have been undertaken for the routes outlined in Table 6.2.1. and Figure 6.2.1.

6.2.2. Journey times have been derived by running the model five times and averaging the length of time it takes vehicles to travel from one point to another. Trips between A, B and C are subject to little or no route choice; therefore there is confidence that the trips will follow the routes drawn in figure 6.2.1. For trips between D and E there is route choice, and therefore the overall journey time will consist of trips undertaking a range of routes.

To/From	A *Hall Walk*	B *Leicester Lane*	C *Blaby Road*	D *Co-Operation Street*	E *Stewart Avenue*
A	-			-	-
B		-		-	-
C			-	-	-
D	-	-	-	-	
E	-	-	-		-

Table 6.2.1 Journey time route matrix

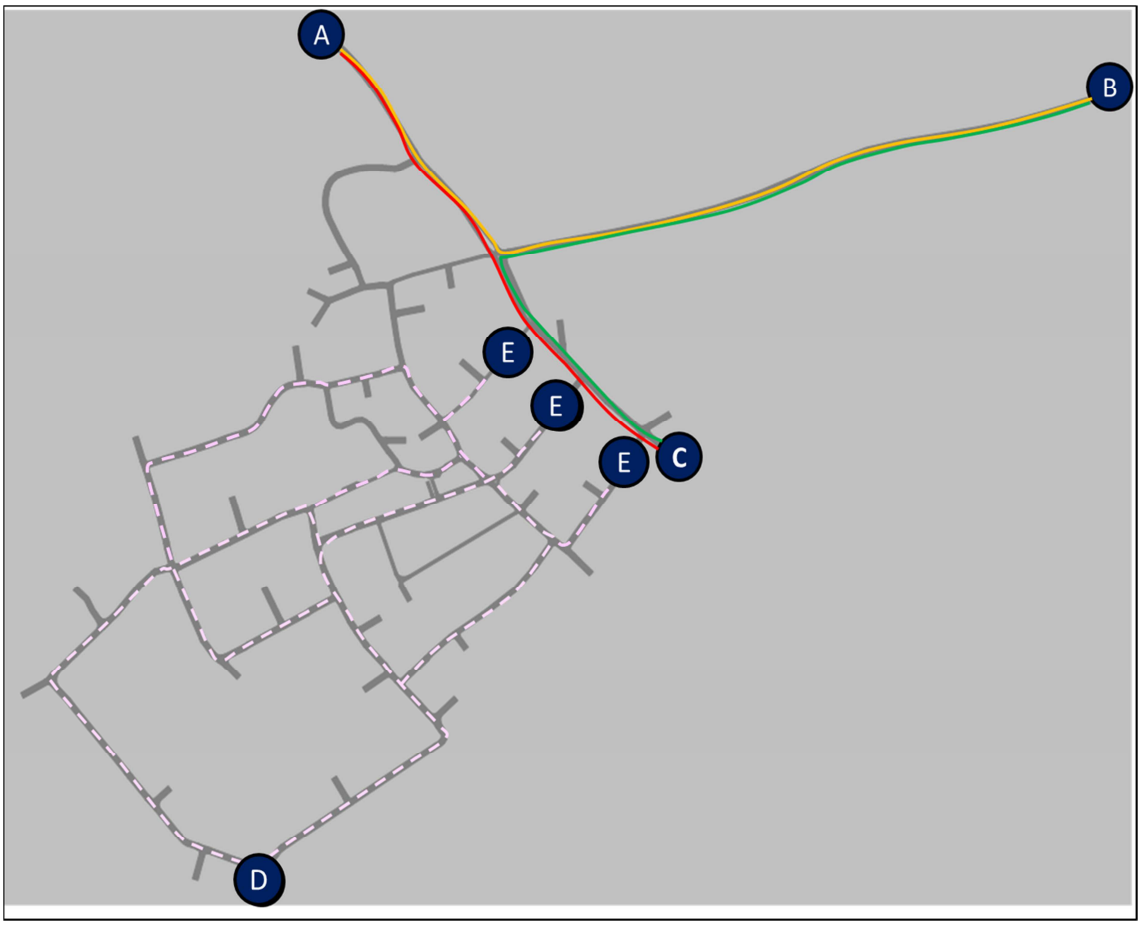

Figure 6.2.1 Journey Time Routes

6.2.3. The results of journey time from the model runs can be found in Table 6.2.2. In general these results back up what was observed in the traffic flows and average speeds analysis section. Trips from point B (Leicester Lane) experience the highest journey times. Trips in Enderby Village, between points D and E, take longer in the AM period in comparison to the PM period. Overall however across all routes, the PM peak period generally performs better than the AM peak period.

Leicestershire County Council

AM-Core	Iteration										Average	
	1		2		3		4		5			
	Vehicles	Time	Vehicles	Time	Vehicles	Time	Vehicles	Time	Vehicles	Time	Vehicles	Time
A -> B	292	204	293	216	306	195	292	215	328	198	302	206
B -> A	352	429	364	332	362	335	360	362	349	248	357	341
A -> C	141	185	129	222	173	181	133	190	154	182	146	192
C -> A	550	111	535	115	572	115	599	107	567	111	565	112
B -> C	1	598	1	173	1	412	1	409	2	343	1	387*
C -> B	18	195	11	145	21	195	15	159	16	169	16	173
D -> E	98	327	102	331	93	313	98	247	94	219	97	288
E -> D	5	213	8	193	6	204	5	266	8	207	6	217

PM-Core	Iteration										Average	
	1		2		3		4		5			
	Vehicles	Time	Vehicles	Time	Vehicles	Time	Vehicles	Time	Vehicles	Time	Vehicles	Time
A>B	410	99	388	118	422	114	430	134	427	137	415	120
B>A	257	504	241	505	253	307	267	394	250	531	254	448
A>C	311	83	339	102	329	99	335	118	331	123	329	105
C>A	293	112	289	119	340	77	294	113	292	122	302	109
B>A	50	509	75	508	61	329	55	396	65	554	61	459
B>C	116	252	115	245	111	185	100	264	100	292	108	248
D>E	106	313	103	382	108	343	106	361	108	337	106	347
E>D	39	207	43	199	42	193	39	203	40	206	41	202

Table 6.2.2 Journey time route results

* Results between points B -> C in the AM have been omitted from averages due to a low number of trips observed in the model.

7. Do Something Scenario

7.1. Do Something Schemes

7.1.1. The Do Something scenario has required the following changes to be implemented within the Enderby Village road network:

- Cross Street (between High Street and Broad Street) southbound only
- Cross Street (between Broad Street and Co-Operation Street) northbound only
- Townsend Road (between Cross Street and George Street) westbound only
- King Street (entire length) westbound only
- John Street (entire length) eastbound only

7.1.2. In addition to the one way schemes, the Leicester bound bus route has been rerouted to avoid King Street (which is now one way), instead using John Street and Mill Lane before re-joining the original route along Co-Operation Street.

7.1.3. Figure 7.1. shows the extent of the proposed one way schemes which are coded into the Do Something scenario.

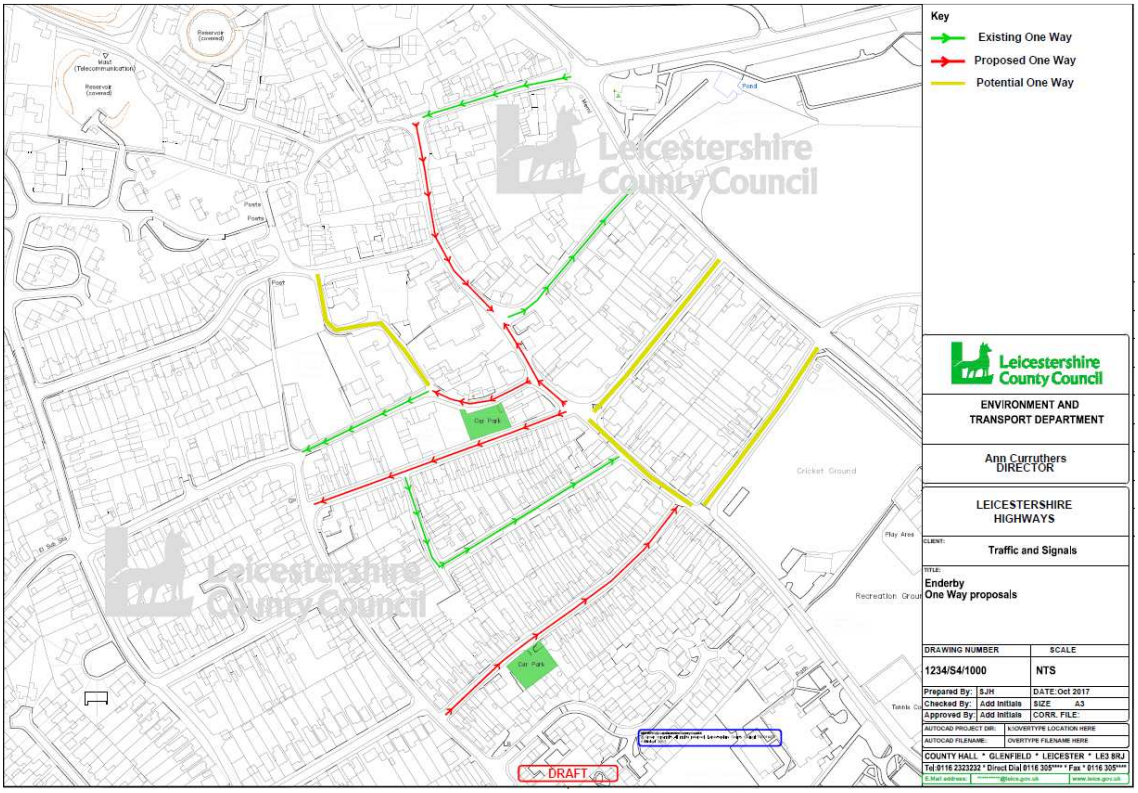

Figure 7.1.1 One way schemes to be coded into the Do Something scenario

7.2. Do Something Traffic Conditions

7.2.1. The model has been re-run with the Do Something network and comparable observations have been made to show the differences between the core and Do Something models.

7.2.2. In the AM Do Something peak hour scenario, the highest flows are observed on the Hall Walk, Leicester Lane and Blaby Road links. Within the village there is a high flow on John Street which results in queues. There is congestion observed on links approaching Blaby Road (Co-Operation Street and parallel routes). The model also predicts that there will be an increase in congestion along Bantam Lane towards Blaby Road. This is because from John Street a higher proportion of trips use Bantam Lane to access Blaby Road. This can be seen in Figure 7.2.1. Queuing is also observed on Mill Road on a less frequent basis. Average speed in the village is broadly comparable to the Core scenario. Notable exception to this however is John Street which is slower; the same is true for the northern section of Cross Street. Figures 7.2.2. and 7.2.3. show both the flow profiles and average speed along links.

Figure 7.2.1 Observed queueing on John Street and links approaching Blaby Road.

Figure 7.2.2 AM Do Something peak hour flow profile (Vehicle/Hour)

Figure 7.2.3 AM Do Something peak hour average speed (KM/H)

7.2.3. In the PM Do Something scenario again there is an increase in traffic using the John Street/Bantlam Lane corridor, however this does not routinely result in congestion within the village area. Queues are observed at the Hall Walk, Leicester Lane and Blaby Road junction, these queues are large, due to the amount of traffic using these links. Model observations can be seen in figure 7.2.4. Plans showing traffic flows and average speeds can be found in figures 7.2.5. and 7.2.6.

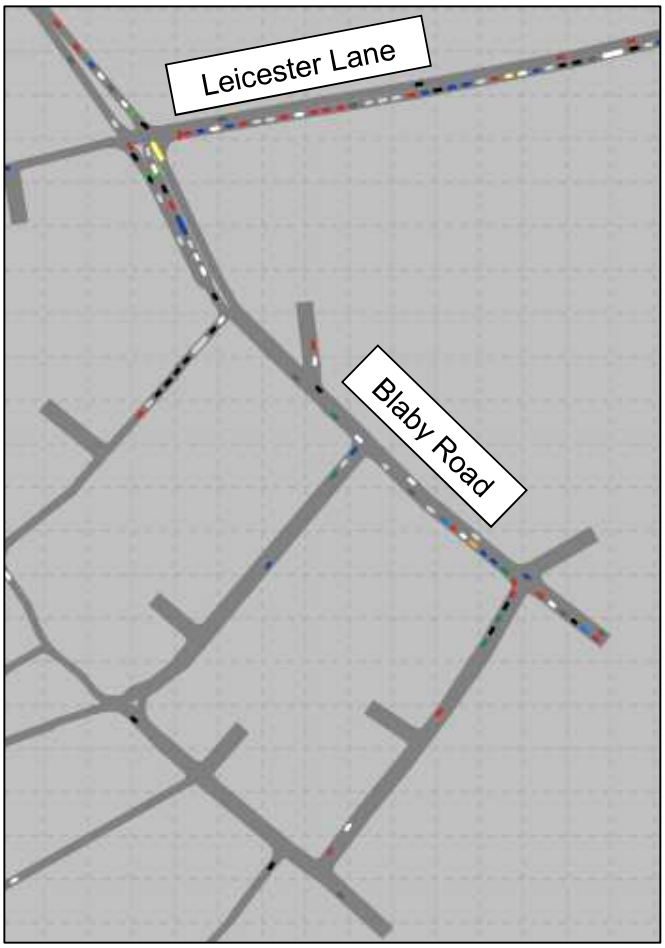

Figure 7.2.4 Standard traffic conditions observed in the PM Do Something Scenario

Figure 7.2.5 PM Do Something peak hour flow profile (Vehicles/Hour)

Figure 7.2.6 PM Do Something peak hour average speed (KM/H)

7.3. Journey Time Comparison

7.3.1. Identical routes have been used to test journey times within the Do Something scenario as in the Core scenario. This therefore gives a true comparison as to the two scenarios.

7.3.2. In isolation the DS journey time results reaffirm that trips approaching Enderby along Leicester Lane (point B) experience the highest journey times, especially in the PM peak. Within Enderby Village trips between points D and E take longer in the AM peak, trips North-East bound taking just under 6 minutes on average. Full results can be found in Table 7.3.1.

7.3.3. Table 7.3.2 and 7.3.3 presents the comparison between the Core and Do Something scenarios.

7.3.4. In the AM peak, generally there is an increase in Journey Time for trips entering the model from points A and C. Trips originating from point B see a slight decrease in journey times. Within Enderby village there are predicted to be increases in journey time for trips both to and from points D and E. The increases in journey time is greatest in the eastbound direction. On the whole, across all journey time routes and weighted depending on the traffic volume there is an increase of 1% in journey times with the implementation of the Do Something Scenario.

7.3.5. The PM peak differences suggest a slight decrease in journey times from point A. Trips originating from points B and C see an increase in journey times. Within the village again there is an increase in time for trips travelling to and from point D to E; this is greatest for eastbound trips. On the whole, across all journey time routes there is an increase of 4.3% in journey times with the implementation of the Do Something Scenario.

Leicestershire County Council

AM-DS	Iteration										Average	
	1		2		3		4		5			
	Vehicles	Time	Vehicles	Time	Vehicles	Time	Vehicles	Time	Vehicles	Time	Vehicles	Time
A -> B	284	226	290	215	316	206	303	183	297	218	298	210
B -> A	365	271	375	359	366	400	374	214	361	225	368	294
A -> C	123	224	147	205	162	199	150	161	138	232	144	204
C -> A	535	110	594	113	504	124	578	111	560	109	554	113
B -> C	0	0	1	491	1	489	0	0	2	367	1	269*
C -> B	22	182	18	183	12	259	15	170	16	151	17	189
D -> E	92	643	98	512	92	174	101	237	99	481	96	409
E -> D	4	346	5	209	8	213	6	249	10	239	7	251

PM-DS	Iteration										Average	
	1		2		3		4		5			
	Vehicles	Time	Vehicles	Time	Vehicles	Time	Vehicles	Time	Vehicles	Time	Vehicles	Time
A>B	410	100	399	116	431	122	431	127	441	130	422	119
B>A	256	506	242	501	253	309	260	432	243	553	251	460
A>C	311	85	348	95	334	102	339	107	346	116	336	101
C>A	264	133	246	134	299	104	290	115	282	118	276	121
B>A	50	511	75	506	62	335	52	432	63	570	60	471
B>C	108	327	95	245	95	254	100	265	98	262	99	271
D>E	123	391	121	544	128	448	125	397	129	425	125	441
E>D	40	246	45	238	40	224	37	228	39	224	40	232

Table 7.3.1 Journey time analysis for the Do Something Scenarios.

* Results between points B -> C in the AM have been omitted from averages due to a low number of trips observed in the model.

AM Diff	Core	DS	Core-DS
	Average (S)	Average (S)	(S)
A -> B	206	210	4
B -> A	341	294	-47
A -> C	192	204	12
C -> A	112	113	1
B -> C	n/a	n/a	n/a
C -> B	173	189	16
D -> E	288	409	122
E -> D	217	251	35
TOTAL	1527	1671	143

PM Diff	Core	DS	Core-DS
	Average (S)	Average (S)	(S)
A -> B	120	119	-2
B -> A	448	460	12
A -> C	105	101	-4
C -> A	109	121	12
B -> C	459	471	12
C -> B	248	271	23
D -> E	347	441	94
E -> D	202	232	30
TOTAL	1578	1744	177

Table 7.3.2 Difference in journey time between the Core and Do Something models. *

* Results between points B -> C in the AM have been omitted due to a low number of trips observed in both the Core and Do Something models.

Difference	Average (S)	Average (%)
AM	20	1.0%
PM	22	4.3%

Table 7.3.3 Vehicle weighted journey time difference for all routes

8. Conclusions

8.1.1. The Enderby Village Microsimulation Model has been produced to show the impact of a proposed traffic management scheme within the village, using a 2017 base year and count data. Through comparing the Core with the Do Something model, the impacts of the scheme has been assessed both through observation and by analysing journey times.

8.1.2. The results of the modelling suggest that the network will be between 1% and 4% slower as a result of the implementation of the Do Something schemes. On the higher trafficked routes (Hall Walk, Leicester Lane and Blaby Road) there is generally little change in observed queuing and traffic behaviour. The scheme is predicted to cause an increase in journey time in all directions within Enderby Village, primarily as a result of reduction of capacity and route choice.

9. Contact Details

We trust that this report meets your requirements and we look forward to having the opportunity to work with you again in the future.

If you have any questions please do not hesitate to contact:

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Leicestershire County Council

Appendix 1

Calibration and Validation results

Project Reference: 3899.005

Leicestershire County Council

AM	Count Site		COUNT	AVERAGE MODELFLOW	# Diff
Turning Movement	1A1	Leicester Lane/ B582/ High Street	390	303	-87.0
	1A2		241	239.4	-1.6
	1A3		12	38	26.0
	1B1		384	362.4	-21.6
	1B2		30	4.8	-25.2
	1B3		13	31.2	18.2
	1C1		13	37.2	24.2
	1C2		479	705	226.0
	1C3		303	154.2	-148.8
	2A1	High Street	8	11.4	3.4
	2A2		54	70.6	16.6
	3A1	Broad Street	174	58.2	-115.8
	3A2		20	14.8	-5.2
	4A1	B582/ Co-Operation Street	249	204.4	-44.6
	4A2		41	81	40.0
	4B1		75	55.6	-19.4
	4B2		435	681.2	246.2
	4C1		186	165.6	-20.4
	4C2		38	58.4	20.4
	5A1	Co-Operation St/ Mill Ln/ King St/ Cross St	15	62.2	47.2
	5A2		50	13.4	-36.6
	5A3		3	1.8	-1.2
	5B1		42	31.6	-10.4
	5B2		33	13.6	-19.4
	5B3		4	66.2	62.2
	5C1		11	1.8	-9.2
	5C2		78	82.8	4.8
	5C3		19	35.8	16.8
	5D1		77	18.2	-58.8
	5D2		191	124	-67.0
	5D3		56	1.4	-54.6
	6A1	Shortridge Lane/ King Street	134	58.8	-75.2
	6A2		26	5	-21.0
	6B1		5	6	1.0
	6B2		28	4.8	-23.2
	6C1		7	2.4	-4.6
	6C2		182	158.6	-23.4
	7A1	Shortridge Lane/ John Street	5	5	0.0
	7A2		52	28.4	-23.6
	7B1		34	43.8	9.8
	7B2		6	25.8	19.8
	7C1		173	139	-34.0
	7C2		99	92.8	-6.2
	8A1	Bantlam Lane/ John Street	101	103.6	2.6
	8A2		5	17.4	12.4
	8B1		33	47.8	14.8
	8B2		88	75.8	-12.2
	8C1		12	44.4	32.4
	8C2		103	56.8	-46.2
	9A1	Mill Lane/ Bantlam Lane	109	76.2	-32.8
	9A2		20	82.4	62.4
	9B1		101	41.2	-59.8
	9B2		75	32.6	-42.4
	9C1		48	121.8	73.8
	9C2		156	38.6	-117.4
					91% Compliance
Link Flow	1A	Hall Walk	637	639.8	2.8
	1B	Leicester Lar	56	73.2	17.2
	1C	Blaby Road	790	870.6	80.6
	2A	High Street	228	128.8	-99.2
	3A	Broad Street	269	219.2	-49.8
	4A	Blaby Road	116	136.6	20.6
	4B	Blaby Road	621	846.8	225.8
	4C	Co-Operatio	53	120.6	67.6
	5A	Cross Street	95	46.8	-48.2
	5B	Co-Operatio	48	81.6	33.6
	5C	Mill Lane	174	136.8	-37.2
	5D	King Street	381	184.2	-196.8
	6A	Shortridge La	31	11	-20.0
	6B	King Street	35	7.2	-27.8
	6C	Shortridge La	187	163.6	-23.4
	7A	Shortridge La	86	72.2	-13.8
	7B	John Street	179	164.8	-14.2
	7C	Shortridge La	200	196.4	-3.6
	8A	Mill Lane	38	65.2	27.2
	8B	Mill Lane	100	120.2	20.2
	8C	John Street	212	133	-79.0
	9A	Mill Lane	121	123.6	2.6
	9B	Bantlam Roa	123	154.4	31.4
	9C	Mill Lane	156	38.6	-117.4
					79% Compliance

PM	Count Site		COUNT	AVERAGE MODELFLOW	# Diff
Turning Movement	1A1	Leicester Lane/ B582/ High Street	418	412.6	-5.4
	1A2		319	407	88.0
	1A3		30	22.4	-7.6
	1B1		296	254.4	-41.6
	1B2		94	68	-26.0
	1B3		68	106.8	38.8
	1C1		27	75.8	48.8
	1C2		392	472.4	80.4
	1C3		162	173.6	11.6
	2A1	High Street	32	3	-29.0
	2A2		98	91.2	-6.8
	3A1	Broad Street	98	63.4	-34.6
	3A2		34	1	-33.0
	4A1	B582/ Co-Operation Street	368	389.8	21.8
	4A2		73	124	51.0
	4B1		141	41.4	-99.6
	4B2		384	490.2	106.2
	4C1		107	106.2	-0.8
	4C2		47	73.2	26.2
	5A1	Co-Operation St/ Mill Ln/ King St/ Cross St	20	70.2	50.2
	5A2		31	9.2	-21.8
	5A3		11	14.2	3.2
	5B1		143	8.4	-134.6
	5B2		95	100.4	5.4
	5B3		21	49.8	28.8
	5C1		21	7.2	-13.8
	5C2		68	29.8	-38.2
	5C3		20	32.6	12.6
	5D1		39	48.4	9.4
	5D2		115	70.4	-44.6
	5D3		24	2.4	-21.6
	6A1	Shortridge Lane/ King Street	90	28.6	-61.4
	6A2		71	166.2	95.2
	6B1		20	56.8	36.8
	6B2		81	64	-17.0
	6C1		13	1.2	-11.8
	6C2		92	96	4.0
	7A1	Shortridge Lane/ John Street	9	2	-7.0
	7A2		121	225.2	104.2
	7B1		59	145	86.0
	7B2		11	1.6	-9.4
	7C1		93	108.8	15.8
	7C2		70	75	5.0
	8A1	Bantlam Lane/ John Street	20	16	-4.0
	8A2		66	17.8	-48.2
	8B1		60	126.8	66.8
	8B2		72	20	-52.0
	8C1		11	43.8	32.8
	8C2		63	32.4	-30.6
	9A1	Mill Lane/ Bantlam Lane	128	175.8	47.8
	9A2		43	32.8	-10.2
	9B1		91	113.8	22.8
	9B2		75	84	9.0
	9C1		39	43.2	4.2
	9C2		90	5.2	-84.8
					95% Compliance
Link Flow	1A	Hall Walk	645	683.8	38.8
	1B	Leicester Lar	189	250.6	61.6
	1C	Blaby Road	586	649	63.0
	2A	High Street	196	154.6	-41.4
	3A	Broad Street	402	390.8	-11.2
	4A	Blaby Road	214	165.4	-48.6
	4B	Blaby Road	491	596.4	105.4
	4C	Co-Operatio	67	143.4	76.4
	5A	Cross Street	185	31.8	-153.2
	5B	Co-Operatio	137	157.4	20.4
	5C	Mill Lane	127	110.8	-16.2
	5D	King Street	229	101.4	-127.6
	6A	Shortridge La	91	223	132.0
	6B	King Street	94	65.2	-28.8
	6C	Shortridge La	101	98	-3.0
	7A	Shortridge La	180	370.2	190.2
	7B	John Street	104	110.4	6.4
	7C	Shortridge La	90	91	1.0
	8A	Mill Lane	126	144.6	18.6
	8B	Mill Lane	83	63.8	-19.2
	8C	John Street	191	208.2	17.2
	9A	Mill Lane	134	146.6	12.6
	9B	Bantlam Roa	114	127.2	13.2
	9C	Mill Lane	90	5.2	-84.8
					92% Compliance

Link Calibration Results

Project Reference: 3899.005

Leicestershire County Council

AM		Count Site	COUNT	MODEL FLOW 1	2	3	4	5	AVERAGE	% Diff	# Diff	COUNT	MODEL FLOW	% Diff
	A1	Moores Lane (Eb)	18	0	3	4	4	2	2.6		-15.4			
	A2	Moores Lane (Wb)	4	9	8	2	7	5	6.2		2.2			
	A3	High Street (Wb)	55	78	79	84	72	75	77.6		22.6			
	A4	Broad Street (Eb)	196	63	74	79	77	86	75.8		-120.2	881	833	0.95
	A5	Co-Operation Street (Eb)	227	216	232	239	227	216	226		-1.0			
	A6	Co-Operation Street (Wb)	120	131	148	149	148	142	143.6		23.6			
	A7	Bantlam Lane (Eb)	128	149	142	143	140	143	143.4		15.4			
	A8	Bantlam Lane (Wb)	133	158	155	151	162	165	158.2		25.2			
	B1	King Street (Wb)	35	12	11	11	14	10	11.6		-23.4			
	B2	King Street (Eb)	326	228	216	210	216	208	215.6		-110.4			
	B3	Cross Street (Nb)	193	162	185	183	193	168	178.2		-14.8	1528	1617	1.06
	B4	Cross Street (Sb)	63	88	81	75	77	77	79.6		16.6			
	B5	Blaby Road (Nb)	621	842	873	805	840	844	840.8		219.8			
	B6	Blaby Road (Sb)	290	270	288	268	307	324	291.4		1.4			
	C1	Hall Walk (Nb)	863	1060	1105	1039	1069	1072	1069	1.24				
	C2	Hall Walk (Sb)	643	556	603	559	604	614	587.2		-55.8			
	C3	Leicester Lane (Eb)	693	442	467	446	474	474	460.6		-232.4	3697	3692	1.00
	C4	Leicester Lane (Wb)	438	394	405	404	407	409	403.8		-34.2			
	C5	Blaby Road (Sb)	265	262	279	251	284	304	276		11.0			
	C6	Blaby Road (Nb)	795	895	928	860	888	904	895	1.13				
	D1	Alexander Avenue (Eb)	44	66	53	62	39	62	56.4		12.4			
	D2	Alexander Avenue (Wb)	13	25	16	17	10	21	17.8		4.8			
	D3	George Street (Eb)	134	34	20	28	29	33	28.8		-105.2			
	D4	George Street (Wb)	53	17	9	11	12	15	12.8		-40.2	640	495	0.77
	D5	Federation Street (Eb)	20	41	42	43	41	49	43.2		23.2			
	D6	Federation Street (Wb)	8	36	30	33	19	31	29.8		21.8			
	D7	West Street (Eb)	277	225	249	227	233	229	232.6		-44.4			
	D8	West Street (Wb)	91	67	78	74	72	77	73.6		-17.4			
			6746	6526	6779	6457	6665	6759						

PM		Count Site	COUNT	MODEL FLOW 1	2	3	4	5	AVERAGE	% Diff	# Diff	COUNT	MODEL FLOW	% Diff
	A1	Moores Lane (Eb)	2	0	0	0	0	1	0.2		-1.8			
	A2	Moores Lane (Wb)	2	13	11	8	8	0	8		6.0			
	A3	High Street (Wb)	151	158	160	173	173	167	166.2		15.2			
	A4	Broad Street (Eb)	132	63	70	67	75	63	67.6		-64.4	949	922	0.97
	A5	Co-Operation Street (Eb)	154	188	174	184	174	174	178.8		24.8			
	A6	Co-Operation Street (Wb)	214	168	168	165	168	157	165.2		-48.8			
	A7	Bantlam Lane (Eb)	112	130	129	124	126	132	128.2		16.2			
	A8	Bantlam Lane (Wb)	182	205	199	222	217	194	207.4		25.4			
	B1	King Street (Wb)	182	117	121	122	123	120	120.6		-61.4			
	B2	King Street (Eb)	101	116	125	129	117	136	124.6		23.6			
	B3	Cross Street (Nb)	245	127	125	128	131	129	128		-117.0	1476	1576	1.07
	B4	Cross Street (Sb)	62	101	91	93	90	92	93.4		31.4			
	B5	Blaby Road (Nb)	445	601	589	640	578	572	596		151.0			
	B6	Blaby Road (Sb)	441	481	543	508	512	522	513.2		72.2			
	C1	Hall Walk (Nb)	688	731	690	772	746	695	726.8		38.8			
	C2	Hall Walk (Sb)	767	810	820	850	866	865	842.2	1.10				
	C3	Leicester Lane (Eb)	580	586	572	590	590	593	586.2		6.2	3461	3822	1.10
	C4	Leicester Lane (Wb)	458	419	430	427	439	432	429.4		-28.6			
	C5	Blaby Road (Sb)	387	482	542	510	514	522	514		127.0			
	C6	Blaby Road (Nb)	581	734	717	768	714	685	723.6		142.6			
	D1	Alexander Avenue (Eb)	30	49	63	60	56	52	56		26.0			
	D2	Alexander Avenue (Wb)	37	25	25	36	35	33	30.8		-6.2			
	D3	George Street (Eb)	89	51	41	45	48	50	47		-42.0			
	D4	George Street (Wb)	191	109	123	112	109	112	113		-78.0	689	872	1.27
	D5	Federation Street (Eb)	11	4	7	3	5	9	5.6		-5.4			
	D6	Federation Street (Wb)	12	16	12	15	9	10	12.4		0.4			
	D7	West Street (Eb)	154	237	228	238	225	238	233.2		79.2			
	D8	West Street (Wb)	165	379	366	370	381	374	374		209.0			
			6575	7100	7141	7359	7229	7129						

Link Validation Results

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